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COTTONSEED OIL: U.S. TRENDS AND MARKET PROSPECTS

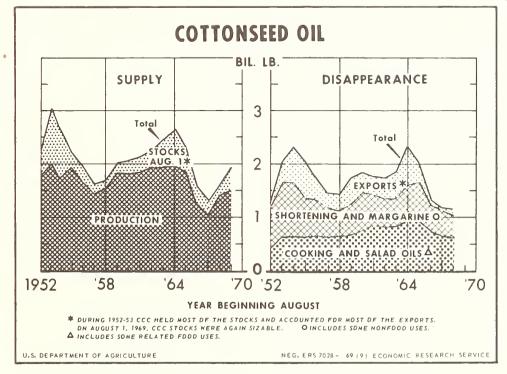
TRI-AGENCY READING RE

By

MAR - 1972

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U.S. cottonseed oil supplies for 1969/70 are estimated at about 1.9 billion pounds, a fifth more than last season. The increase is due mostly to the 1968/69 accumulation of CCC stocks.

Domestic use of cottonseed oil declined steadily from 1.7

billion pounds in 1965/66 to a near-record low of 1.0 billion last season, with a sharp drop in its usage as a cooking and salad oil. Soybean oil has largely captured these markets; it is both substitutable and lower priced. (See page 21)

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### COTTONSEED OIL: U.S. TRENDS AND MARKET PROSPECTS

by

George W. Kromer

Cottonseed oil, once a premium commodity used in making salad and cooking oil, has lost markets in recent years as technical developments have permitted major refiners to shift to soybean salad oil.

The shift was accelerated during the 1968/69 marketing year as cottonseed oil prices averaged nearly 3¢ per pound over soybean oil -- almost double the historical price spread. The price differential would have been narrower if it had not been necessary for the Commodity Credit Corporation (CCC) to step in and support cottonseed oil prices at a relatively high level. Consequently, the CCC acquired 331 million pounds of cottonseed oil under the price support program -about a fourth of the 1968 crop. Because of its high price, cottonseed oil usage dropped a tenth during the year; soybean oil usage rose by the same proportion. CCC also acquired about 144,000 tons of cottonseed meal under the program -- about 7% of the meal produced.

The last previous CCC product purchases under the cottonseed price support program were during 1963/64 when 169 million pounds of cottonseed oil (crude basis) were acquired. When the support program acquisitions were at their peak in the early 1950's, CCC stocks of cottonseed oil reached 1.0 billion pounds on July 31, 1953 (table 16). This oil was subsequently sold into export at world

price levels. During 1951-54, CCC supported cottonseed prices via purchase of products--oil, meal, and linters. A major drawback of the "package program" was CCC's inability to handle and store the meal acquired because it deteriorated when held for any substantial length of time.

Cottonseed oil will continue to face stiff competition in domestic markets during the 1969/70 marketing year even though the cottonseed support price has been reduced from \$48 to \$37 per ton-proportionately more than the drop in soybean price supports, though on a dollar per ton basis, close to the \$10 reduction per ton of sovbeans. Cottonseed oil prices likely will average somewhat below the 1968/69 level but above soybean oil. Cottonseed oil and meal will continue to have difficulty in regaining markets which were lost to soybean products, urea, fish meal, and imported palm oil during the 1966-68 period of short cottonseed supplies. This situation could again result in CCC acquiring large quantities of cottonseed oil under the 1969 support program.

Cottonseed is a source of income on about half a million U.S. cotton farms. The value of the relatively small 1968 cottonseed crop was \$234 million; the 1961-65 average value was almost \$300 million.

### Cottonseed Output Up Slightly; Prices to Farmers Down

The 1969 cottonseed crop, as of September 1, was estimated at 4.7 million tons compared with 4.6 million last year and 3.2 million in 1967 (table 17). The slight increase is attributed to the larger cotton acreage--resulting from cancellation of required diversion and diversion payment provisions previously

in effect--since yield per acre this year is off 8%. About  $11\frac{1}{11}$  million acres are expected to be harvested in 1969, about 10% above 1968.

The season average price received by farmers for 1969-crop cottonseed is forecast at around \$40 per ton, \$10-\$11

Table 16.--Cottonseed and cottonseed oil: Price support operations, crop years,  $1947{-}69$ 

|                          | ,<br>202  | stocks of                    | basis, July 31     | Mil.<br>1b.   |       |         |         |         |  | 82.5    | -      | 135.5      | 800.0       | 57.8  | 10/   |       |        | -     |          | 1 (   | 0.6   | 120.0  |            |             |       | 331            |       |
|--------------------------|---|------------------------------|--------------------|---------------|-------|---------|---------|---------|--|---------|--------|------------|-------------|-------|-------|-------|--------|-------|----------|-------|-------|--------|------------|-------------|-------|----------------|-------|
| 8                        | ру ссс  |                              | crude              | Mil.<br>1b.   |       |         |         |         |  | 198.9   | 1      | 136.2      | 281. 1      | 227.3 |       | -     | 1 1    | 180.5 |          | 1 6   | 0.6   | 168.9  |            | -           |       | 331.           |       |
| t operation              | Acquired by CCC   | v d                          | seed               | Thou.<br>tons |       |         |         |         | NO PROGRAM<br>NO PROGRAM<br>NO PROGRAM | 805.5   | -      | ٦.         | -           |       | -     | -     | 1      | -     |          |       | 1     |        | -          |             |       |                |       |
| Price support operations | purchased   | Percentage                   | of output :        | Pct.          |       |         |         | 4       | N ON SE                                | 12.4    | -      | 7.8        | 47.9<br>9.8 | 13.1  | 1 1   | -     |        | 11.9  | 1        |       | ζ. ;  |        | -          | 1           | 1 1   | 23.2           | •     |
|                          | Placed under loan or purchased<br>under support program | As oil,                      | crude<br>basis     | M51.<br>1b.   |       |         |         |         |  |         | -      | 136.2      | 874.4       | 204.1 | - 1   | -     | 1      | 180.5 |          | 1 1   | 0.6   | 168.9  |            | I<br>I<br>I | 1     | 331            |       |
|                          | Placed under  | 0                            | seed               | Thou.<br>tons |       |         |         |         |  | 811.5   |        | <u>٠</u> . |             | †°T   | • 1   |       |        | -     | !        | -     | -     |        | -          | -           | -     |                | -     |
|                          | •• •• ••  | Production                   | ** ** **           | Thou.<br>tons | 4,553 | 5,202   | 4,666   | 3,664   | 3,514<br>4,682<br>5,945                | 6,559   | 4,105  | 6,286      | 6,190       | 5,740 | 6,50  | 5,407 | 4,609  | 4,798 | 5,991    | 5,886 | 5,978 | 6,139  | 6,237      | 6,087       | 3,960 | 3,210<br>4,625 | h.    |
|                          | Season<br>average                                       | price<br>received<br>by      | farmers<br>per ton | Dol.          | 47.65 | 45.61   | 52.70   | 51,10   | 85.90<br>67.20                         | 43.40   | 86.60  | 69.30      | 09.69       | 25.70 | 09.44 | 53.40 | 51.10  | 43.80 | 38.80    | 42.60 | 51.10 | 47.90  | 47.10      | 46.70       | 65.90 | 50.50          |       |
|                          |   | Purchase level<br>per ton to | Farmer<br>5/       | Dol.          |       | 8/47.50 | 8/53.00 | 8/53.00 |  | 46.50   | 7.00   | 61.50      | 62,40       | 50.50 | 75.00 | 00.44 | 42.00  | 41.00 | 34.00    | 34.00 | 45.00 | 8.8    | 00°†       | 43.00       | 00.84 | 48.00<br>48.00 | 37.00 |
| Cottonseed               | 7   | : Purcha                     | Ginner<br>4/       | Dol.          | -     | 49.00   | 55.00   | 55.00   |  | 49.50   | 51.00  | 65.50      | 04.99       | 54.50 | 26.00 | 48.00 | 76.00  | 72.00 | 38.00    | 38.00 | 00.64 | 2000   | 48.00      | 47.00       | 52.00 | 20,00          | 41.00 |
|                          | Level of support  | Percentage                   | of<br>parity 3/    | Bct.          | 1     | 139     | 138     | 136     |  | 06      | 73     | 96         | 06          | 75    | 55.   | 2     | 9      | 69    | 22       | 22    | 78    | 76     | 2.2<br>(1) | 99          | 47    | 71             | 20.   |
|                          | Leve  | Basis grade<br>100) per ton  | Purchase :         | Dol.          |       | 1       |         |         | OGRAM<br>OGRAM<br>OGRAM                | 9/46.50 | 147.00 | 61.50      | 62.40       | 50.50 | 00.00 | 00.44 | 42.00  | 41.00 | 34.00    | 34.00 | 45.00 | 00.444 | 00.44      | 43.00       | 48.00 | 00.84          | 37.00 |
|                          |   | Basis<br>(100)               | Loan<br>2/         | Dol.          |       | 00°64/Z | 7/55.00 | 7/55.00 | NO PROGRAM NO PROGRAM                  | 2/50.65 | 51,00  | 65.50      | 04.99       | 24.50 | 24.00 | 48.00 | 146.00 | 45.00 | 38.00    | 38.00 | 49.00 | 48.00  | 71:        | -           | -     |                | -     |
|                          |   | Crop of                      |                    |               | 1941  | 1942    | 1943    | 1945    | 1946<br>1947                           | 1949    | 1950   | 1951       | 1952 :      | 1953  | 1954  | 1956  | 1957   |       | : 656T N | 1960  | 1961  | 1962   | 1964       | 1965        | 1966  | 1967           | 1969  |

Herices of cottonseed were supported during 1942-45 through purchases of oil, meal, and linters from crushers who paid support prices for cottonseed. In 1950, prices were supported through loans to and purchases from producers, including purchases of cottonseed from ginners. During 1951-54, prices were supported through loans as agents for CCC. In 1950, prices were supported through loans to producers and purchases of cottonseed from ginners. During 1951-54, prices were supported through loans to producers and purchases of cottonseed from ginners. However, cottonseed also, in 1951 and 1952. In 1955-62, prices were supported through loans to producers and purchase supported through purchases greeneuts, also, in 1951 and 1955-62, prices were supported through loans to producers and purchase from producers and ginners. From 1958, however, cottonseed are placed under loan in earlier years. During 1963-65 support decended through purchases from producers and ginners. Support decended through purchases from producers and participating ginners Cottonseed are placed under loan in earlier years. During 1965-69, support as partiasive managed purchases of cottonseed in 1966-69, support as participating ginners. Octonseed are placed under loan in earlier years. During 1965-69, support participating purchase contracts with participating ginners. Support was partials and participating participating participating for producers and ginners. Support was permissive in all years and ginners, which was generally \$4 less than the loan settlement rate. After 1962, the purchase price to farmers was quoted as the support price per net ton to ginners. Support participating for the years 1942-45 are based on the relationshy between participating prices as of dugges shown relate to partly prices on the following dates: 1949, August 11, 1951, 4954, April 11, 1955, March 11, 1954, April 11, 1954, April 11, 1955, March 11, 1954, April 11, 1954, A

Table I7.--Cottonseed: Acreage, yield, supply, disposition and price, 1930-69

| er ton        | Support<br>(purchase<br>price)               | Dollars        |  | No Program No Program No Program No Program  | 47.00<br>60.50<br>60.50<br>70.00<br>70.00<br>70.00<br>70.00<br>70.00<br>70.00<br>70.00<br>70.00<br>70.00 | 34.00<br>145.00<br>141.00<br>141.00<br>141.00<br>141.00<br>141.00<br>141.00<br>141.00<br>141.00<br>141.00<br>141.00<br>141.00<br>141.00<br>141.00<br>141.00<br>141.00<br>141.00<br>141.00<br>141.00<br>141.00<br>141.00<br>141.00<br>141.00<br>141.00<br>141.00<br>141.00<br>141.00<br>141.00<br>141.00<br>141.00<br>141.00<br>141.00<br>141.00<br>141.00<br>141.00<br>141.00<br>141.00<br>141.00<br>141.00<br>141.00<br>141.00<br>141.00<br>141.00<br>141.00<br>141.00<br>141.00<br>141.00<br>141.00<br>141.00<br>141.00<br>141.00<br>141.00<br>141.00<br>141.00<br>141.00<br>141.00<br>141.00<br>141.00<br>141.00<br>141.00<br>141.00<br>141.00<br>141.00<br>141.00<br>141.00<br>141.00<br>141.00<br>141.00<br>141.00<br>141.00<br>141.00<br>141.00<br>141.00<br>141.00<br>141.00<br>141.00<br>141.00<br>141.00<br>141.00<br>141.00<br>141.00<br>141.00<br>141.00<br>141.00<br>141.00<br>141.00<br>141.00<br>141.00<br>141.00<br>141.00<br>141.00<br>141.00<br>141.00<br>141.00<br>141.00<br>141.00<br>141.00<br>141.00<br>141.00<br>141.00<br>141.00<br>141.00<br>141.00<br>141.00<br>141.00<br>141.00<br>141.00<br>141.00<br>141.00<br>141.00<br>141.00<br>141.00<br>141.00<br>141.00<br>141.00<br>141.00<br>141.00<br>141.00<br>141.00<br>141.00<br>141.00<br>141.00<br>141.00<br>141.00<br>141.00<br>141.00<br>141.00<br>141.00<br>141.00<br>141.00<br>141.00<br>141.00<br>141.00<br>141.00<br>141.00<br>141.00<br>141.00<br>141.00<br>141.00<br>141.00<br>141.00<br>141.00<br>141.00<br>141.00<br>141.00<br>141.00<br>141.00<br>141.00<br>141.00<br>141.00<br>141.00<br>141.00<br>141.00<br>141.00<br>141.00<br>141.00<br>141.00<br>141.00<br>141.00<br>141.00<br>141.00<br>141.00<br>141.00<br>141.00<br>141.00<br>141.00<br>141.00<br>141.00<br>141.00<br>141.00<br>141.00<br>141.00<br>141.00<br>141.00<br>141.00<br>141.00<br>141.00<br>141.00<br>141.00<br>141.00<br>141.00<br>141.00<br>141.00<br>141.00<br>141.00<br>141.00<br>141.00<br>141.00<br>141.00<br>141.00<br>141.00<br>141.00<br>141.00<br>141.00<br>141.00<br>141.00<br>141.00<br>141.00<br>141.00<br>141.00<br>141.00<br>141.00<br>141.00<br>141.00<br>141.00<br>141.00<br>141.00<br>141.00<br>141.00<br>141.00<br>141.00<br>141.00<br>141.00<br>141.00<br>141.00<br>141.00<br>141.00<br>141.00<br>141.00<br>141.00<br>141.00<br>141.00<br>141.00<br>141.00<br>141.00<br>141.00<br>141.00<br>141.00<br>141.00<br>141.00<br>141.00<br>141.00<br>141.00<br>141.00<br>141.00<br>141.00<br>141.00<br>141.00<br>141.00<br>141.00<br>141.00<br>141.00<br>141.00<br>141.00<br>141.00<br>141.00<br>141.00<br>141.00<br>141.00<br>141.00<br>141.00<br>141.00<br>141.00<br>141.00<br>141.00   |
|---------------|--|----------------|--|--|--|---|
| Price per ton | Season average price received by farmers 5/; | Dollars        | 22.04<br>8.97<br>12.333<br>12.333<br>33.08<br>33.54<br>19.51<br>19.51<br>12.17                   | 21,73<br>47,65<br>45,61<br>52,10<br>52,70<br>51,10<br>72,00<br>85,90<br>67,20<br>43,40           | 86.66<br>69.30<br>60.30<br>72.70<br>72.46<br>71.10<br>88.80<br>88.80                                     | 42.60<br>51.10<br>47.90<br>50.70<br>46.70<br>65.90<br>55.90<br>57.00<br>57.00<br>57.00  |
|               | Residual<br>4/                               | 1,000<br>tons  | 1,136<br>654<br>455<br>409<br>409<br>829<br>829<br>405   | 130<br>227<br>349<br>385<br>213<br>214<br>291<br>180<br>180                                      | 180<br>313<br>190<br>190<br>196<br>205<br>228<br>249   | 165<br>1188<br>1129<br>129<br>14,24<br>14,34<br>60<br>60<br>60  |
| а             | sed for ting Per acre planted                | Pounds         | **********   | 3084305533   | 888888888  | 888883<br>88888<br>88888<br>88888<br>88888  |
| Disposition   | 13 3   | 1,000<br>tons  | 607<br>607<br>607<br>607<br>607<br>607<br>607<br>607<br>607<br>607                               | 367<br>367<br>317<br>279<br>386<br>3350<br>3350<br>279   | 415<br>405<br>705<br>866<br>866<br>888<br>244<br>244<br>244<br>244                                       | 281<br>232<br>232<br>233<br>223<br>153<br>149<br>158<br>158   |
| Di            | Exports 2/                                   | 1,000<br>tons  |  | mm44000  | 9112119119   | W C 0 8 C 0 W C 4   |
|               | Crushings                                    | 1,000<br>tons  | 4,715<br>7,328<br>4,621<br>4,157<br>3,550<br>8,498<br>6,326<br>6,326<br>4,471                    | 4,398<br>4,198<br>3,295<br>4,254<br>1,082<br>7,332<br>5,332                                      | 3,723<br>5,476<br>6,256<br>5,249<br>5,249<br>1,247<br>5,488<br>6,439<br>7,433                            | 5,352<br>5,833<br>5,833<br>5,833<br>5,887<br>5,734<br>3,731<br>3,107<br>4,363   |
|               | Total :(                                     | 1,000<br>tons  | 6,073<br>6,073<br>6,113<br>6,113<br>7,133<br>1,724<br>7,886<br>7,886<br>1,990                    | 6,034<br>6,034<br>6,034<br>6,034   | 4,394<br>6,352<br>6,352<br>5,933<br>7,938<br>4,773<br>4,773<br>6,991                                     | 5,090<br>6,166<br>6,166<br>6,405<br>6,405<br>7,164<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064<br>7,064 |
| r'A           | Stocks at mills,                             | 1,000<br>tons  | 45<br>223<br>300<br>223<br>90<br>42<br>223<br>42<br>337<br>121                                   | 1132 821 129 821 129 821 129 821 129 83 132 132 132 132 132 132 132 132 132 13                   | 288<br>66<br>137<br>155<br>229<br>209<br>177<br>164<br>1175  | 105<br>188<br>188<br>280<br>280<br>156<br>209<br>209<br>159<br>159  |
| Supply        | Stocks at Imports; mills,                    | 1,000<br>tons  | 21 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1   |  |  |   |
|               | Pro-   | 1,000<br>tons  | 6,028<br>7,310<br>5,815<br>5,815<br>7,511<br>7,634<br>7,472<br>1,950<br>1,950                    | 7, 2, 2, 2, 2, 2, 2, 2, 2, 2, 2, 2, 2, 2,  | t, 105<br>6,186<br>6,190<br>6,176<br>5,778<br>6,043<br>1,609<br>1,798<br>7,798                           | 5,886<br>(6,139<br>(6,139<br>(6,139<br>(6,137<br>(6,037<br>(1,625<br>(1,625<br>(1,625)  |
| 1 9           | Planted                                      | Pounds         | 278<br>374<br>370<br>370<br>330<br>330<br>7/403  | 7/435<br>7/401<br>7/453<br>491<br>491<br>434<br>511  | 7,447<br>4447<br>7,535<br>7,535<br>7,705<br>7,705<br>7,705<br>7,705<br>7,705<br>7,705<br>7,705           | 732<br>721<br>721<br>721<br>765<br>860<br>860<br>848<br>848   |
| Cottonseed    | yield ber                                    | Pounds         | 284<br>378<br>324<br>375<br>317<br>337<br>467<br>408<br>409                                      | 100<br>100<br>100<br>100<br>100<br>100<br>100<br>100<br>100<br>100                               | 466<br>478<br>478<br>554<br>793<br>714<br>689<br>810   | 765<br>765<br>789<br>871<br>888<br>894<br>803<br>803<br>910<br>837  |
| 900000        | Harvested Harvested                          | 1,000<br>acres | 42,444<br>38,704<br>35,891<br>29,383<br>26,866<br>297,509<br>297,509<br>224,248<br>23,805        | 23,861<br>22,236<br>22,602<br>21,610<br>17,029<br>17,029<br>17,330<br>22,911<br>27,439           | 17,843<br>26,949<br>25,921<br>24,341<br>16,928<br>15,928<br>11,928<br>11,849<br>15,117                   | 15,309<br>15,634<br>115,569<br>116,559<br>116,055<br>13,615<br>9,552<br>10,160<br>11,224  |
| Co++00        |  | 1,000<br>acres | 43,329<br>39,110<br>36,194<br>40,248<br>40,248<br>27,860<br>28,063<br>34,090<br>25,018<br>24,690 | 24,871<br>23,130<br>23,302<br>21,900<br>19,956<br>17,533<br>18,553<br>21,560<br>23,253<br>27,914 | 18,629<br>28,195<br>27,185<br>25,244<br>19,791<br>17,506<br>16,333<br>14,310<br>12,379<br>15,833         | 16,080<br>16,588<br>16,523<br>16,623<br>14,1843<br>14,152<br>10,349<br>10,942<br>11,961   |
|               | Year<br>beginning<br>August                  |                | 1932<br>1932<br>1933<br>1934<br>1935<br>1936<br>1938<br>1939                                     | 1940<br>1941<br>1942<br>1944<br>1944<br>1946<br>1946<br>1948                                     | 1952<br>1952<br>1953<br>1954<br>1955<br>1955<br>1955   | 1960<br>1962<br>1963<br>1965<br>1966<br>1968<br>1970  |

in cultivation July 1, 1930-56, planted acres 1957 to date. 2/Not reported separately prior to 1941. 3/In the following year. Before 1943, seed used for planting was computed at a constant rate for each State. The United States averaged range between 30 and 32 pounds per acre in cultivation July 1.

4/Mainly used on farms for feed and fertilizer. 5/Marketing year weighted average price by States weighted by total sales in each State. 6/Less than 500 tons. 7/Based on acres in cultivation July 1 less acres removed to meet allotments. 8/Preliminary. 9/Forecast.

below 1968, and about in line with the \$11 per ton reduction in the CCC support price. Support for 1969-crop cottonseed is \$37 per ton, basis (100) grade. By law, cottonseed and soybeans must be supported at levels that will enable them to compete on equal terms in the market.

Cottonseed marketings are highly seasonal. Cotton moves from farm to gin where it is separated into lint and seed. Ginners ship seed to the oil mills about as rapidly as it is acquired. Cotton harvesting begins in south Texas in early July and moves northward, eastward, and westward as the season progresses. In the northern part of the Cotton Belt, picking usually begins by mid-September and is largely completed by December. The

length of the harvesting season depends primarily on weather and on the availability of mechanical harvesters, and in limited areas hand pickers. About 90% of the U.S. cotton crop is now mechanically harvested.

The cottonseed supply is determined primarily by the economic factors that affect cotton. Cottonseed output therefore does not adjust to changing demands and price levels for oilseeds, edible oils, and oilmeals. With each 100 pounds of cotton fiber, cotton plants yield approximately 170 pounds of cottonseed. Only about 5% of this seed is required to plant the following year's crop. The remaining 95% is the basis for the cotton-seed crushing industry.

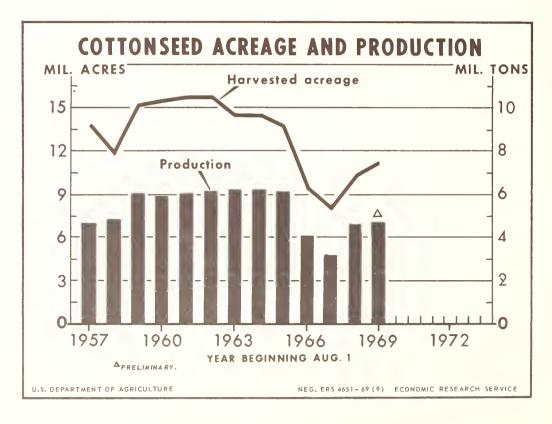


Figure 1

Table 18.--Cottonseed: Harvested acreage, production, crushings, and price, by regions, 1960-69

| Year<br>beginning<br>August   |   | est<br>_/  |  | thwest<br>2/   |  | _  |  | theast   | : United : States  |
|---|---|--|--|--|--|--|--|--|--|
|   | 1,000<br>acres  | Percent of U.S.  | 1,000<br>acres   | Percent of U.S.  | 1,000<br>acres   | Percent of U.S.  | 1,000<br>acres   | Percent<br>of U.S  | 1,000<br>acres   |
|   |   |  |  |  | creage harv  |  |  |  |  |
| 1961<br>1962<br>1963<br>1964<br>1965  | 1,138   | 10.3<br>9.0<br>9.1<br>9.2<br>9.3<br>9.1<br>10.5<br>11.8<br>11.2              | 6,955<br>7,205<br>7,112<br>6,440<br>6,250<br>6,120<br>4,348<br>3,895<br>4,505<br>5,265 | 45.4<br>46.1<br>45.7<br>45.3<br>44.5<br>45.0<br>45.5<br>49.2<br>44.3<br>46.9 | 4,284<br>4,404<br>4,404<br>4,042<br>4,080<br>3,974<br>2,774<br>2,262<br>3,049<br>3,377 | 28.0<br>28.2<br>28.5<br>28.5<br>29.0<br>29.2<br>29.1<br>27.8<br>30.0<br>30.1 | 2,493<br>2,616<br>2,605<br>2,420<br>2,421<br>2,280<br>1,424<br>883<br>1,468<br>1,418 | 16.3<br>16.7<br>16.7<br>17.0<br>17.2<br>16.7<br>14.9<br>11.2<br>14.5       | 15,309<br>15,634<br>15,569<br>14,212<br>14,057<br>13,615<br>9,552<br>7,997<br>10,160<br>11,224 |
|   |   |  |  | Cotto  | nseed produ  | ction  |  |  |  |
|   | 1,000<br>tons   | Percent of U.S.  | 1,000<br>tons  | Percent of U.S.  | 1,000<br>tons  | Percent of U.S.  | 1,000<br>tons  | Percent of U.S.  | 1,000<br>tons  |
| 1960<br>1961<br>1962<br>1963<br>1964<br>1965<br>1966<br>1967<br>1968 <u>5</u> / | 1,258<br>1,125<br>1,145   | 21.3<br>19.3<br>20.5<br>18.2<br>18.4<br>18.1<br>19.9<br>22.0<br>23.0<br>21.3 | 2,006<br>2,192<br>2,140<br>1,945<br>1,863<br>2,051<br>1,410<br>1,274<br>1,597<br>1,577 | 34.1<br>36.7<br>34.9<br>31.4<br>29.9<br>33.7<br>35.6<br>39.7<br>34.5<br>33.6 | 1,834<br>1,870<br>1,938<br>2,186<br>2,240<br>2,065<br>1,282<br>947<br>1,527<br>1,639   | 31.2<br>31.3<br>31.6<br>35.3<br>35.9<br>33.9<br>32.4<br>29.5<br>33.0<br>34.9 | 789<br>765<br>803<br>936<br>989<br>867<br>481<br>283<br>438                          | 13.4<br>12.7<br>13.0<br>15.1<br>15.8<br>14.3<br>12.1<br>8.8<br>9.5<br>10.2 | 5,886<br>5,978<br>6,139<br>6,192<br>6,237<br>6,087<br>3,960<br>3,210<br>4,625<br>4,696         |
| •   |   |  |  | Cotto  | onseed crus  | hed  |  |  |  |
| 1960<br>1961<br>1962<br>1963<br>1964<br>1965<br>1966<br>1967<br>1968 <u>5</u> / | 1,102<br>992<br>1,139<br>1,011<br>919<br>985<br>666<br>682<br>960 | 20.6<br>17.9<br>19.5<br>17.2<br>15.5<br>17.2<br>17.6<br>22.0<br>22.0         | 1,886<br>1,927<br>2,087<br>1,961<br>1,951<br>1,844<br>1,366<br>1,246<br>1,644          | 35.2<br>34.8<br>35.8<br>33.3<br>32.9<br>32.2<br>36.0<br>40.1<br>37.7         | 1,664<br>1,884<br>1,865<br>2,092<br>2,192<br>1,990<br>1,292<br>922<br>1,396            | 31.1<br>34.0<br>32.0<br>35.5<br>37.0<br>34.7<br>34.1<br>29.7<br>32.0         | 700<br>736<br>742<br>823<br>864<br>915<br>467<br>257<br>363                          | 13.1<br>13.3<br>12.7<br>14.0<br>14.6<br>15.9<br>12.3<br>8.2<br>8.3         | 5,352<br>5,539<br>5,833<br>5,887<br>5,926<br>5,734<br>3,791<br>3,107<br>4,363                  |
| •   |   |  | Sonson avo   | rago price re  | polived by   | farmers for o  | ottonseed  |  |  |
| •   | Dol.  | Percent of U.S.  | Do1.   | Percent<br>of U.S.   | Dol.   | Percent<br>of U.S.   | Dol.   | Percent of U.S.  | Dol.   |
| 1960<br>1961<br>1962<br>1963<br>1964<br>1965<br>1966<br>1967<br>1968 <u>5</u> / | 49.32<br>55.28  | 115<br>108<br>105<br>97<br>102<br>102<br>93<br>98<br>103                     | 41.05<br>51.05<br>47.30<br>52.75<br>47.60<br>46.45<br>66.45<br>56.30<br>49.80          | 96<br>100<br>99<br>104<br>101<br>99<br>101<br>102<br>99                      | 39.70<br>48.67<br>46.26<br>50.44<br>46.49<br>45.66<br>65.14<br>55.00<br>49.59          | 93<br>95<br>97<br>99<br>99<br>99<br>98<br>99<br>100<br>98                    | 36.32<br>44.97<br>44.83<br>46.72<br>43.07<br>42.57<br>62.40<br>51.48<br>49.30        | 85<br>88<br>94<br>92<br>91<br>91<br>95<br>93                               | 42.60<br>51.10<br>47.90<br>50.70<br>47.10<br>46.70<br>65.90<br>55.20<br>50.50                  |

<sup>1/</sup> West includes California, Arizona, New Mexico, and Nevada. 2/ Southwest includes Texas and Oklahoma.
3/ Valley includes Missouri, Arkansas, Tennessee, Mississippi, Louisiana, Illinois, and Kentucky. 4/ Southeast includes Virginia, North Carolina, South Carolina, Georgia, Florida, and Alabama. 5/ Preliminary. 6/ Indicated September 1, 1969.

Table 19. -- Cottonseed and Cottonseed Oil: Crushings, production, exports and stocks, by quarters, 1964-68

|                        | Z. S.  |               | 000  | + = 0  | 10 10 ~ mm  | O + cumbo                                | m\0 = 0 0   |   |
|------------------------|--|---------------|--|--|---|--|---|---|
| sed Oil                | Stocks,<br>Exports:end of                            | Mil.          | 450<br>519<br>583<br>421<br>421                      | 244<br>313<br>409<br>409<br>301                      | 246<br>435<br>477<br>298<br>298                     | 199<br>312<br>312<br>158<br>158          | 153<br>346<br>461<br>440  |   |
| ottonse                | Exports  | Mil.          | 192<br>203<br>161<br>142<br>699                      | 10t<br>126<br>82<br>335                              | 133   | 22411                                    | 29<br>54<br>11<br>132   |   |
| Total Cottonseed Oil   | Produc-<br>tion<br>(crude)                           | Mil.<br>16.   | 410<br>704<br>584<br>301<br>1,999                    | 395<br>700<br>556<br>245<br>1,896                    | 282<br>526<br>329<br>124<br>1,261                   | 180<br>452<br>289<br>115<br>1,036        | 225<br>528<br>429<br>242<br>242   |   |
|                        | ľ  | Mil.<br>1b.   | 347<br>385<br>445<br>347                             | 164<br>212<br>290<br>249<br>249                      | 176<br>299<br>340<br>260<br>260                     | 138<br>224<br>251<br>137<br>137          | 90<br>201<br>346<br>376<br>376  |   |
| Refined Cottonseed Oil | Exports Refined: and further: ed:processed:          | Mil.<br>1b.   | 54<br>39<br>46<br>17                                 | 110  | 14<br>14<br>14<br>17                                | 22772                                    | 14<br>9<br>15<br>35   |   |
| ined Cotto             | Exports Refined Once : further refined; processed    | Mil.<br>1b.   | 106<br>75<br>59<br>66<br>306                         | 78<br>53<br>45<br>15<br>191                          | 23<br>7<br>10<br>10                                 | 6<br>2<br>5<br>15                        | 1<br>118<br>118<br>52   |   |
| Ref                    | Production,<br>oncerrefined                          | Mil.<br>1b.   | 303<br>543<br>491<br>310<br>1,647                    | 325<br>551<br>518<br>298<br>1,692                    | 213<br>429<br>348<br>203<br>1,193                   | 136<br>372<br>300<br>156                 | 159<br>394<br>370<br>276<br>1,199   |   |
|                        | period<br>Total                                      | Mil.<br>1b.   | 1,097<br>1,362<br>586<br>152<br>152                  | 1,076<br>1,255<br>556<br>154<br>154                  | 535<br>840<br>385<br>142                            | 353<br>588<br>245<br>51<br>51            | 1,071<br>1,99<br>1,43<br>1,43   |   |
|                        | 4 1 1 8  | Mil.<br>1b.   | 103<br>134<br>138<br>74                              | 80<br>101<br>119<br>52<br>52                         | 70<br>136<br>38<br>38                               | 28 62 12                                 | 64<br>115<br>115<br>64  |   |
| 011                    | Stocks<br>Oil<br>mills                               | Mil.<br>1b.   | 994<br>1,228<br>448<br>78<br>78                      | 996<br>1,154<br>437<br>102<br>102                    | 1,65<br>704<br>249<br>104<br>104                    | 292<br>198<br>184<br>30                  | 624<br>926<br>384<br>79   |   |
| Crude Cottonseed 011   | Exports  | M11.          | 32<br>89<br>56<br>53<br>237                          | 20<br>27<br>13<br>120                                | 10 00 12 00   | 10                                       | 7 th  |   |
| rude Cott              | Refining loss:                                       | Pct.          | 0,4 4.0  | ~~~~~~<br>~~~~~~~~                                   | ~~~~~~~~~~~~~~~~~~~~~~~~~~~~~~~~~~~~~~              | 6.0.0<br>6.0.0                           | 7 4 4 8<br>00 1 0 1 0 1 0 1 0 1 0 1 0 0 1 0 0 1 0 0 1 0 0 0 1 0 |   |
| D .                    | Refin  | Mil.          | 16<br>37<br>35<br>19<br>107                          | 18<br>30<br>30<br>101                                | 22 28 27 72 72 72                                   | 10 52 60                                 | 881 691 49  |   |
|                        | Produc- Used in<br>tion refining                     | M11.          | 319<br>580<br>525<br>330<br>1,754                    | 343<br>582<br>552<br>317<br>1,794                    | 225<br>454<br>369<br>217<br>1,265                   | 146<br>392<br>321<br>165<br>1,024        | 167<br>412<br>380<br>293<br>1,262   |   |
|                        | Produc-  | Mil.<br>1b.   | 1,999  | 395<br>700<br>556<br>245<br>1,896                    | 282<br>526<br>329<br>124<br>1,261                   | 180<br>452<br>289<br>115                 | 225<br>528<br>429<br>242<br>242   |   |
|                        | Stocks<br>at<br>mills,<br>end<br>of                  | Thou.<br>tons | 1,983<br>2,457<br>896<br>156<br>156                  | 1,993<br>2,308<br>874<br>204<br>204<br>204           | 936<br>1,407<br>1,99<br>209<br>209                  | 585<br>997<br>367<br>61<br>61            | 1,248<br>1,853<br>768<br>158  |   |
| Cottonseed             | Received at at at crushing mills, of mills of period | Thou.<br>tons | 1,241<br>2,121<br>1,715<br>849<br>5,926              | 1,207<br>2,131<br>1,679<br>717<br>5,734              | 863<br>1,582<br>977<br>369<br>3,791                 | 551<br>1,351<br>866<br>339<br>3,107      | 702<br>1,631<br>1,304<br>726<br>4,363   |   |
|                        | Received<br>at<br>crushing<br>mills                  | Thou.<br>tons | 3,056<br>2,595<br>154<br>108<br>5,913                | 3,044<br>2,446<br>245<br>47<br>5,782                 | 1,595<br>2,054<br>68<br>68<br>79<br>3,796           | 927<br>1,764<br>237<br>33<br>2,961       | 1,888<br>2,237<br>218<br>218<br>117   |   |
|                        | Year<br>and<br>quarter                               |               | 1964/65<br>AugOct.<br>NovJan.<br>FebApr.<br>May-July | 1965/66<br>AugOct.<br>NovJan.<br>FebApr.<br>May-July | 1966/67<br>AugOct.<br>NovJan<br>FebApr.<br>May-July | 1967/68 AugOct. NovJan. FebApr. May-July | 1968/69 AugOct. NovJan. FebApr. May-July  | 1969/70 AugOct. NovJan. FebApr. May-July Year |

1/ Represents difference between crude oil used in refining and refined oil production. 2/ Includes hydrogenated oil. 3/ Includes Atearin and oils not fully refined.

Table 20.--Cottonseed: Crushings and yields of oil and meal per ton crushed, and price, by months, crop years 1954-68

| Year :  |  |   | : :   |  |  | Crus   | hings  |  |   |  |  |  |  |
|---|--|---|---|--|--|--|--|--|---|--|--|--|--|
| Year<br>begin- :<br>ning :<br>August :                                  | Aug.   | Sept.   | Oct.  | Nov.   | Dec.   | Jan.   | Feb.   | March  | April   | May  | June   | July   | Total<br>or<br>average   |
|   |  | 1,000<br>tons   | 1,000<br>tons   | 1,000<br>tons  | 1,000<br>tons  | 1,000<br>tons  | 1,000<br>tons  | 1,000<br>tons  | 1,000<br>tons   | 1,000<br>tons  | 1,000<br>tons  | 1,000<br>tons  | 1,000<br>tons  |
| 1954<br>1955  | 251<br>212   | 532<br>494  | 684<br>708  | 659<br>78 <b>1</b>   | 609<br>672   | 598<br>692   | 514<br>618   | 438<br>497   | 318<br>387  | 285<br>258   | 197<br>151   | 165<br>119   | 5 <b>,24</b> 9<br>5,588  |
| 1956<br>1957<br>1958<br>1959  | 148  | 526<br>348<br>307<br>502<br>413   | 723<br>648<br>711<br>778<br>758                             | 678<br>613<br>590<br>723<br>742                                      | 572<br>544<br>547<br>656<br>613                                      | 613<br>523<br>547<br>633<br>667                                      | 492<br>409<br>440<br>577<br>526                                      | 400<br>327<br>433<br>528<br>480                                      | 280<br>255<br>324<br>374<br>402                       | 226<br>180<br>179<br>252<br>292                      | 148<br>127<br>117<br>177<br>176                      | 120<br>132<br>97<br>143<br>143                         | 4,959<br>4,247<br>4,439<br>5,491<br>5,352                            |
| 1961<br>1962<br>1963<br>1964<br>1965<br>1966<br>1967<br>1968<br>1968    | 000  | 334<br>513<br>485<br>392<br>411<br>205<br>106<br>125                          | 750<br>752<br>726<br>679<br>644<br>506<br>307<br>504        | 753<br>778<br>745<br>733<br>716<br>550<br>497<br>523                 | 629<br>646<br>637<br>705<br>701<br>530<br>426                        | 659<br>707<br>697<br>683<br>714<br>503<br>429<br>570                 | 598<br>627<br>616<br>612<br>655<br>379<br>342<br>477                 | 539<br>548<br>544<br>630<br>608<br>381<br>293<br>443                 | 437<br>415<br>451<br>472<br>415<br>217<br>231<br>385  | 298<br>291<br>348<br>382<br>333<br>133<br>148<br>336 | 215<br>176<br>242<br>260<br>228<br>144<br>103<br>238 | 183<br>153<br>174<br>206<br>156<br>92<br>87<br>153     | 5,539<br>5,833<br>5,887<br>5,926<br>5,734<br>3,791<br>3,107<br>4,363 |
| :   | Lb.  | Lb.   | Lb.   | Lb.  | Lb.  | Lb.  | oll per ton  | Lb.  | Lb.   | Lb.  | Lb.  | Lb.  | Lb.  |
| 1954<br>1955  | 332  | 311<br>323  | 321<br>334  | 327<br>336   | 32 <b>4</b><br>337   | 328<br>334   | 331<br>342   | 345<br>343   | 348<br>352  | 358<br>354   | 3 <b>41</b><br>360                                   | 345<br>367   | 33 <b>1</b><br>339   |
| 1956<br>1957<br>1958<br>1959  | 320<br>341<br>326<br>337<br>349                                      | 314<br>331<br>314<br>326<br>323   | 335<br>345<br>336<br>336<br>340                             | 339<br>334<br>343<br>336<br>336                                      | 337<br>333<br>337<br>336<br>336                                      | 339<br>334<br>344<br>335<br>336                                      | 347<br>345<br>347<br>341<br>340                                      | 349<br>341<br>344<br>343<br>340                                      | 358<br>343<br>360<br>350<br>343                       | 363<br>343<br>365<br>344<br>345                      | 365<br>340<br>356<br>354<br>343                      | 356<br>341<br>359<br>359<br>336                        | 340<br>339<br>342<br>339<br>338                                      |
| 1961 : 1962 : 1963 : 1964 : 1965 : 1966 : 1967 : 1968 <b>1</b> / 1969   | 3 <b>3</b> 9<br>3 <b>2</b> 9   | 327<br>326<br>323<br>324<br>323<br>331<br>317<br>317                          | 340<br>327<br>336<br>325<br>329<br>327<br>326<br>323        | 341<br>332<br>338<br>332<br>330<br>333<br>336<br>320                 | 334<br>330<br>333<br>332<br>329<br>331<br>331<br>323                 | 333<br>329<br>332<br>333<br>326<br>334<br>336<br>327                 | 336<br>333<br>336<br>336<br>328<br>334<br>333<br>329                 | 338<br>338<br>342<br>338<br>332<br>338<br>338<br>331                 | -335<br>341<br>343<br>348<br>335<br>341<br>330<br>331 | 330<br>348<br>342<br>353<br>340<br>325<br>354<br>334 | 348<br>354<br>358<br>358<br>356<br>345<br>343<br>339 | 347<br>335<br>348<br>352<br>325<br>327<br>314<br>329   | 337<br>333<br>336<br>337<br>331<br>333<br>333<br>326                 |
| 1907  |  |   |   |  |  | Yield of   | meal per to  | n crushed  |   |  |  |  |  |
| 1954 :<br>1955 :  | 971<br>974   | 9 <b>79</b><br>944  | 966<br>928  | 972<br>949   | 966<br>943   | 98 <b>1</b><br>9 <b>2</b> 8  | 991<br>931   | 1,000<br>926   | 969<br>926  | 98 <b>1</b><br>956                                   | 968<br>985   | 947<br>1,051   | 976<br>942   |
| 1956 :<br>1957 :<br>1958 :<br>1959 :                                    | 939<br>1,000<br>940<br>939<br>981                                    | 946<br>963<br>881<br>906<br>917   | 960<br>928<br>940<br>925<br>929                             | 969<br>918<br>950<br>931<br>931                                      | 962<br>910<br>952<br>925<br>938                                      | 957<br>913<br>922<br>916<br>930                                      | 972<br>917<br>917<br>928<br>941                                      | 963<br>915<br>902<br>934<br>936                                      | 975<br>921<br>937<br>940<br>942                       | 999<br>905<br>959<br>926<br>944                      | 987<br>877<br>945<br>940<br>966                      | 978<br>901<br>9 <b>3</b> 4<br>981<br>931               | 964<br>9 <b>22</b><br>929<br>928<br>936                              |
| 1961<br>1962<br>1963<br>1964<br>1965<br>1966<br>1967<br>1968 <u>1</u> / | 950<br>905<br>914<br>972<br>946<br>930<br>953<br>919                 | 895<br>927<br>923<br>928<br>930<br>989<br>928<br>873                          | 906<br>933<br>954<br>933<br>924<br>940<br>921<br>919        | 911<br>941<br>949<br>925<br>945<br>946<br>922<br>918                 | 912<br>936<br>957<br>922<br>949<br>941<br>925<br>918                 | 908<br>926<br>937<br>923<br>935<br>944<br>924<br>896                 | 898<br>940<br>950<br>927<br>932<br>945<br>944<br>906                 | 901<br>940<br>953<br>935<br>945<br>966<br>957<br>908                 | 879<br>950<br>944<br>943<br>951<br>986<br>934<br>908  | 879<br>952<br>949<br>951<br>944<br>947<br>994<br>921 | 928<br>985<br>965<br>970<br>961<br>939<br>925<br>899 | 929<br>942<br>1,006<br>959<br>929<br>958<br>896<br>887 | 905<br>937<br>948<br>935<br>940<br>950<br>934<br>9 10                |
| :   | Dol.   | <u>Dol.</u>   | Dol.  | Dol.   | Dol.   | Dol.   | Dol.   | Dol.   | Dol.  | Dol.   | Dol.   | Dol.   | Dol.   |
| 1954<br>1955  | 61.30<br>50.10   | 61.60<br>43.70  | 60.20<br>43.50  | 59.40<br>44.30   | 59.60<br>45.00   | 56.80<br>45.50   | 55.20<br>46.20   | 53.40<br>46.80   | 53.40<br>46.90  | 53.10<br>47.30                                       | 52.00<br>47.40                                       | 54.00<br>49.00   | 60.30<br>44.60   |
| 1956<br>1957<br>1958<br>1959<br>1960                                    | 55.70<br>47.60<br>42.80  | 47.70<br>53.20<br>45.50<br>37.90<br>39.20                                     | 54.10<br>49.80<br>43.20<br>39.10<br>42.60                   | 59.20<br>50.00<br>43.50<br>38,80<br>44.40                            | 59.90<br>50.50<br>43.00<br>39.10<br>45.20                            | 60.40<br>51.20<br>43.30<br>39.60<br>44.60                            | 58.60<br>49.40<br>43.80<br>39.60<br>44.70                            | 60.60<br>51.20<br>45.40<br>39.80<br>44.80                            |   |  |  | 55.00<br>45.00<br>42.00<br>38.00<br>49.00              | 53.40<br>51.10<br>43.80<br>38.80<br>42.60                            |
| 1961<br>1962<br>1963<br>1964<br>1965<br>1966<br>1967<br>1968 <u>1</u> / | 49.90<br>47.40<br>50.60<br>44.90<br>45.80<br>62.90<br>52.00<br>52.90 | 47.50<br>47.30<br>49.60<br>44.70<br>46.30<br>65.50<br>51.80<br>51.00<br>37.80 | 51.50<br>47.80<br>51.50<br>47.30<br>46.70<br>65.90<br>54.10 | 52.40<br>48.10<br>51.80<br>47.70<br>46.40<br>65.60<br>56.00<br>50.50 | 51.50<br>47.60<br>50.70<br>48.60<br>47.80<br>65.90<br>57.00<br>50.30 | 50.90<br>48.20<br>49.00<br>49.20<br>47.80<br>65.30<br>56.40<br>49.90 | 51.50<br>48.50<br>48.70<br>48.20<br>47.50<br>63.30<br>57.80<br>50.20 | 50.90<br>49.00<br>46.30<br>47.70<br>47.60<br>63.50<br>56.10<br>49.90 |   |  |  | 49.00<br>49.00<br>49.00<br>46.00                       | 51.10<br>47.90<br>50.70<br>47.10<br>46.70<br>65.90<br>55.20          |

1969: 37.80

1/ Preliminary.

2/ Monthly prices by States weighted by sales to obtain a weighted average for the United States; season average prices by States weighted by sales during the crop marketing season to obtain the United States average.

3/ Season average price includes an allowance for unredeemed loans.

### Crushings Increase Since Small Crop in 1967

Stocks of cottonseed at crushing mills on August 1, 1969, the beginning of the marketing year, totaled 159,300 tons compared with 60,800 tons last year. This brings total supplies of cottonseed for 1969/70 to an estimated 4.9 million tons, nearly 4% above last year. Crushings for the season are forecast at 4.5 million tons, up from the 4.4 million in 1968/69. A crush this size would produce around 1.5 billion pounds of crude cottonseed oil (1.4 billion in 1968/69) and 2.1 million tons of cottonseed meal (2.0 million tons last season).

Cottonseed crushings are also seasonal but not to the same extent as the movement of seed from the gins to the mills. Roughly half of the year's supply of seed reaches the mills during August-October. By the end of January, 94% of the year's crop is already crushed or in storage at the oil mills. While some cottonseed is processed every month. about 20% of the season's crush occurs during August-October and nearly 60% by the end of January (table 19). Most crushers operate round-the-clock because of the rapid movement of seed early in the season and the perishability of cotton seed (especially when moisture content is high).

According to trade sources, about half the U.S. cottonseed crop is processed by solvent extraction (prepress and direct) and the other half is handled mainly by continuous mechanical screw presses. Shifts in the areas of cotton production over the years--from the Southeast to the Mississippi Valley and West--along with relatively small crops during the past 3 years, have resulted in excess crushing capacity for the cottonseed industry and a reduction in the number of plants. Some cottonseed mills crush other oilseeds such as soybeans and peanuts, when supplies are available.

The proportion of the U.S. cottonseed crop crushed in the Southeast declined from an average of 14% in 1963-65 to less than 10% in 1966-68. Meanwhile, the Mississippi Valley's share dropped from 36% to 32%. On the other hand, the Southwest increased its share from 33% to 38% while the West rose from 17% to over 20% (figure 2).

Yields of cottonseed per acre in the West average about  $2\frac{1}{2}$  times those in the Southeast. For this reason, the West accounted for only 11% of the U.S. cotton acreage in 1968 but 23% of the seed produced (table 18). In contrast, the Southeast comprised  $14\frac{1}{2}\%$  of total acreage but only  $9\frac{1}{2}\%$  of the 1968 cottonseed crop.

#### Crusher Spread Narrows

Each of the 4 major products turned out by cottonseed crushing mills enters markets that are highly competitive with substitute products. Oil is the most valuable primary product, accounting for about half the total value of cottonseed products. Meal ranks second, comprising about one-third of the total value. The oil is used almost entirely as a food whereas the meal (protein) and hulls (roughage) are used principally as livestock feed. Linters enter into a wide variety of chemical and nonchemical products.

Cottonseed crushers consider prospects for the combined value of products in determining prices they will offer for seed. For this reason, the season average price received by farmers for cottonseed usually varies with the total value of products obtained per ton of cottonseed. During 1968/69 the spot price spread between the total value of products (Memphis) and the price received by farmers for cottonseed narrowed (table 21).

Table 21. -- Cottonseed: Yield, price, and value of products per ton of seed crushed and price spread, 1930-68

| 1                 |            |                                      | l .     |   |   |   |   |      |
|-------------------|------------|--------------------------------------|---------|---|---|---|---|------|
| Spread<br>between | : value of | products and cotton- seed farm price | Dollars | 14.<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10.00<br>10 | 19.99<br>16.78<br>20.88<br>19.54<br>19.54<br>50.25<br>17.22<br>34.73                            | 64.98<br>28.13<br>26.13<br>24.58<br>27.13<br>28.94<br>29.94<br>29.33  | 31.42<br>29.07<br>21.42<br>29.09<br>29.37<br>39.57<br>38.48<br>28.88          |      |
| Cotton-           | seed,      | average<br>price<br>received         | Dollars | 22.00<br>10.30<br>12.90<br>33.50<br>19.50<br>19.50<br>19.50<br>19.50<br>19.50   | 21.70<br>47.60<br>75.60<br>72.10<br>72.10<br>72.00<br>72.00<br>72.00<br>72.00<br>72.00          | 86<br>69<br>69<br>69<br>69<br>69<br>69<br>73<br>73<br>74<br>75<br>75<br>80<br>80<br>80<br>80<br>80<br>80<br>80<br>80<br>80<br>80<br>80<br>80<br>80  | 42.60<br>51.10<br>47.90<br>50.70<br>47.10<br>46.70<br>65.90<br>55.20          |      |
| 00 00             |            | Total : value : of : products :      | Dollars | 36.27<br>20.59<br>20.59<br>20.59<br>37.59<br>33.50<br>33.50<br>33.50<br>33.50<br>33.50<br>33.50   | 41.69<br>64.38<br>66.48<br>72.60<br>77.05<br>77.05<br>132.17<br>136.16<br>84.42<br>78.13        | 131.52<br>97.47<br>97.47<br>97.47<br>98.93<br>98.89<br>74.97<br>68.13   | 74.02<br>80.17<br>72.32<br>77.00<br>77.00<br>86.27<br>93.68<br>79.38          |      |
|                   |            | Value                                | Dollars | 2844458848<br>868886446664666   | 0 0 0 0 0 0 0 0 0 0 0 0 0 0 0 0 0 0 0   | # # # # # # # # # # # # # # # # # # #   | 1 0 6 6 6 6 6 6 6 6 6 6 6 6 6 6 6 6 6 6                                       |      |
|                   | Hulls      | Price $\frac{1}{}$                   | Cents   | 146<br>100<br>100<br>100<br>100<br>100<br>100<br>100<br>100<br>100<br>10  | ₹84666888   | 86. 15. 29. 29. 25. 25. 25. 25. 25. 25. 25. 25. 25. 25  | .35<br>.75<br>.75<br>.75<br>.75<br>.10<br>.10<br>.10                          |      |
|                   |            | Yield                                | Pounds  | 553<br>567<br>568<br>514<br>514<br>519<br>519<br>508  | 693221<br>693221<br>693221<br>693221<br>693221  | # # # # # # # # # # # # # # # # # # #   | 122<br>123<br>123<br>123<br>123<br>123<br>123<br>123<br>123<br>123            |      |
|                   |            | Value                                | Dollars | 10000000000000000000000000000000000000  | 8.88<br>7.7.7.88<br>1.18.93<br>12.16<br>9.92<br>12.16<br>9.93                                   | 29.99<br>10.06<br>10.95<br>8.43<br>7.41<br>7.67<br>6.14   | 5.60<br>5.60<br>5.60<br>5.60<br>5.60<br>5.60<br>5.60<br>5.60                  |      |
| seed crushed      | Linters    | Price :                              | Cents   |   | 03.00.00.00.00.00.00.00.00.00.00.00.00.0  | 0,0<br>0,0<br>0,0<br>0,0<br>0,0<br>0,0<br>0,0<br>0,0<br>0,0<br>0,0  | 1,000,000,000,000,000,000,000,000,000,0                                       |      |
| ton of see        |            | Yield :                              | Pounds  | 101<br>97<br>97<br>136<br>138<br>138<br>151<br>151<br>149<br>149  | 165<br>178<br>178<br>176<br>182<br>191<br>183<br>176  | 185<br>184<br>184<br>184<br>177<br>177<br>176<br>176<br>1179  | 177<br>176<br>171<br>171<br>171<br>176<br>176<br>188<br>188<br>188            |      |
| Per t             |            | Value                                | Dollars | 12.22<br>6.22<br>14.24<br>10.20<br>10.20<br>10.02<br>10.03  | 11.81<br>15.99<br>16.76<br>28.57<br>28.90<br>38.13<br>86.14<br>86.14<br>86.14<br>86.14<br>86.14 | 25.54<br>25.54<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55<br>25.55     | 25.83<br>30.73<br>30.05<br>30.05<br>37.34<br>36.18<br>36.18                   |      |
|                   | Meal       | Price 1/                             | Cents   |   | 0.0.0.0.0.0.0.0.0.0.0.0.0.0.0.0.0.0.0.  |   | 0.0.0.0.0.0.0.0.0.0.0.0.0.0.0.0.0.0.0.  |      |
|                   |            | Yield                                | Pounds  | 900<br>900<br>900<br>900<br>900<br>900<br>900<br>900<br>900<br>900  | 888<br>874<br>928<br>879<br>879<br>882<br>882<br>897  | 88<br>88<br>88<br>88<br>88<br>88<br>88<br>88<br>88<br>88<br>88  | 936<br>937<br>937<br>937<br>937<br>937<br>937<br>937<br>937                   |      |
|                   |            | Value                                | Dollars | 19.61<br>10.14<br>10.99<br>12.74<br>26.46<br>26.32<br>27.72<br>27.72<br>108.77  | 21.12<br>37.85<br>37.85<br>39.19<br>39.25<br>39.37<br>77.43<br>49.22<br>40.31                   | 65.39<br>41.50<br>44.55<br>44.45<br>43.63<br>45.12<br>45.12<br>45.16<br>33.09   | 39.34<br>41.75<br>34.53<br>33.16<br>33.16<br>42.47<br>42.92<br>42.19<br>37.69 |      |
|                   | 011        | Price<br>1/                          | Cents   | 0.00.00.00.00.00.00.00.00.00.00.00.00.0   | 6.45.65.65.65.65.65.65.65.65.65.65.65.65.65   | 20<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13.53<br>13. | 13000133331<br>488888863  |      |
|                   |            | Yield                                | Pounds  | 306<br>313<br>313<br>313<br>313<br>313<br>310<br>315<br>315<br>315  | 325<br>311<br>312<br>313<br>313<br>315<br>323<br>323<br>323                                     | 33.5<br>33.5<br>33.5<br>33.5<br>33.5<br>33.5<br>33.5<br>33.5  | 333<br>333<br>333<br>333<br>333<br>333<br>333<br>333<br>333<br>33             |      |
|                   | Year       | begin-<br>ning<br>August             |         | 1930<br>1932<br>1933<br>1934<br>1935<br>1936<br>1939  | 1940<br>1941<br>1942<br>1943<br>1945<br>1945<br>1946  | 1950<br>1951<br>1952<br>1953<br>1955<br>1956<br>1959  | 1960<br>1961<br>1962<br>1964<br>1965<br>1965<br>1968<br>3/                    | 1970 |

If Simple average price per pound for the 12 months of the marketing year beginning August using the following quotations: Cottonseed oil, crude, f.o.b. southeastern mills; beginning 1937 f.o.b. Valley points; cottonseed meal, 41 percent protein, bulk, carlots, Memphis; cottonseed hulls, carload lots, Atlanta; linters weighted average price for all grades and market points, f.o.b. mills, 2/ Estimated by ERS beginning in 1956. 3/ Preliminary.

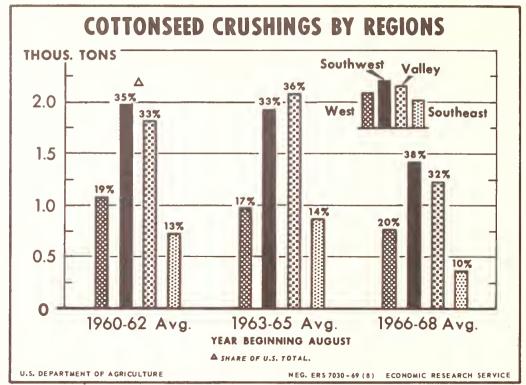


Figure 2

### Cottonseed Oil Supply Rising--Usage Declining

Beginning stocks of cottonseed oil (crude and refined) on August 1, 1969, were 1410 million pounds, nearly 3 times as great as in 1968. The increase was due entirely to CCC holdings of 331 million pounds, whereas a year ago, the Corporation had no inventory of cotton oil. Output for the 1969/70 season is forecast at 1,500 million pounds, bringing total cottonseed oil supplies to 1,940 million pounds. This is 350 million pounds or 22% above the previous year's supply and 45% more than in 1967/68 (table 23).

Domestic disappearance of cottonseed oil during the current marketing year is forecast to total around the 1.0 billion pounds utilized in 1968/69, which was the smallest since 1946. The lowest annual consumption in years on record occurred in 1921 when 0.9 billion pounds were utilized and the record high of 2.0 billion pounds was achieved in 1937. In the post World War II era, the highest level occurred in 1953, when 1.7 billion pounds were used. In more recent years cottonseed oil consumption has dropped steadily from just under 1.7 billion pounds in 1965 to the 1.0 billion pounds last season.

Cooking and salad oil is the major outlet for cottonseed oil, accounting for three-fifths of total domestic use (table 24). In recent years manufacturers of cooking and salad oils have been turning more to blended vegetable oils or switching to lower priced soybean oil. Cottonseed oil going into salad and cooking oils fell 36% during the past 5 years--from 1.0 billion pounds in 1964 to 0.6 billion in 1968. Consumption in margarine and shortening has also dropped but not to the same extent. Soybean oil has captured a good share of these traditional markets from cottonseed oil; mainly because of improved quality, making it substitutable for cottonseed oil, and lower prices. The outlook for cottonseed oil recouping these former markets is bleak unless its price becomes competitive once again with

Table 22.—Cottonseed oil: Supply, disposition and price, by months, crop years, 1955-69

|  |   |  |   |   |   | Production   |   |  |   |  |   |   |  |
|--|---|--|---|---|---|--|---|--|---|--|---|---|--|
| Year<br>Begin-<br>ning<br>August   | August  | September  | <b>O</b> ctober   | November  | December  | January  | February  | March  | April   | May  | June  | July  | Total<br>or<br>Average   |
|  | Mil.<br>lb.   | Mil.<br>lb.  | Mil.<br>1b.   | Mil.<br>lb.   | Mil.<br>lb.   | Mil.<br>1b.  | Mil.<br>lb.   | Mil.<br>1b.  | Mil.<br>1b.   | Mil.<br>1b.  | Mil.<br>lb.   | Mil.<br>lb.   | Mil.<br>1b.  |
| 1955<br>1956<br>1957<br>1958<br>1959<br>1960<br>1961<br>1962<br>1963<br>1964<br>1965<br>1966<br>1967<br>1968 1/1 | 70<br>58<br>48<br>48<br>50<br>49<br>75<br>70<br>70<br>70<br>70<br>70<br>70<br>70<br>70<br>70<br>70<br>70<br>70<br>70  | 159<br>165<br>115<br>96<br>164<br>133<br>109<br>167<br>157<br>127<br>133<br>68<br>34<br>40   | 237<br>242<br>224<br>239<br>262<br>258<br>255<br>244<br>244<br>227<br>212<br>166<br>101<br>163                  | 263<br>230<br>204<br>202<br>243<br>249<br>257<br>255<br>252<br>243<br>236<br>183<br>167<br>168                  | 227<br>193<br>181<br>185<br>220<br>206<br>218<br>212<br>234<br>231<br>175<br>141<br>174     | 231<br>208<br>175<br>188<br>212<br>224<br>219<br>232<br>231<br>227<br>233<br>168<br>144<br>186                 | 211<br>170<br>141<br>153<br>197<br>179<br>201<br>209<br>207<br>206<br>215<br>127<br>114<br>156                          | 171<br>139<br>112<br>149<br>181<br>164<br>185<br>185<br>214<br>202<br>129<br>99<br>146                                   | 136<br>100<br>87<br>117<br>131<br>138<br>146<br>141<br>155<br>165<br>139<br>74<br>76<br>127                     | 91<br>82<br>62<br>65<br>87<br>101<br>98<br>101<br>119<br>135<br>113<br>144<br>53   | 54<br>43<br>43<br>60<br>762<br>87<br>81<br>53<br>80   | 43<br>43<br>45<br>35<br>51<br>48<br>64<br>51<br>60<br>73<br>51<br>30<br>27<br>50                | 1,894<br>1,685<br>1,438<br>1,518<br>1,861<br>1,865<br>1,942<br>1,981<br>1,999<br>1,896<br>1,261<br>1,036<br>1,424        |
|  | :   |  | - 4   |   |   |  | st of month   |  |   | -1 -   |   |   |  |
| 1957<br>1958<br>1959<br>1960<br>1961<br>1962<br>1963<br>1964<br>1965<br>1966                                     | 398<br>284<br>202<br>168<br>212<br>227<br>227<br>237<br>247<br>514<br>624<br>421<br>301<br>298<br>298<br>298<br>298<br>298<br>298<br>298                          | 346<br>232<br>136<br>128<br>152<br>200<br>183<br>271<br>466<br>513<br>292<br>233<br>246<br>119   | 361<br>254<br>146<br>121<br>190<br>217<br>170<br>296<br>488<br>433<br>236<br>202<br>207<br>99                   | 439<br>345<br>203<br>226<br>299<br>321<br>245<br>380<br>555<br>450<br>244<br>246<br>199<br>153                  | 528 401 242 294 380 390 320 461 637 535 281 309 229 214                                     | 570<br>416<br>257<br>387<br>454<br>427<br>392<br>530<br>694<br>596<br>300<br>382<br>252<br>273                 | 609<br>437<br>281<br>424<br>476<br>434<br>434<br>610<br>740<br>519<br>313<br>435<br>314                                 | 597<br>457<br>298<br>437<br>480<br>463<br>463<br>671<br>804<br>547<br>366<br>477<br>328<br>377                           | 552<br>427<br>314<br>481<br>524<br>448<br>478<br>699<br>802<br>569<br>396<br>514<br>325<br>430                  | 540<br>395<br>280<br>414<br>500<br>433<br>513<br>675<br>812<br>583<br>409<br>477<br>312                                    | 462<br>353<br>251<br>347<br>448<br>379<br>458<br>619<br>774<br>560<br>392<br>417<br>263<br>466                    | 366<br>275<br>215<br>273<br>356<br>313<br>402<br>562<br>712<br>492<br>314<br>365<br>201<br>468  |  |
|  |   |  |   |   |   | Expor  | ts 2/   |  |   |  |   |   |  |
| 1956<br>1957<br>1958<br>1959<br>1960<br>1961   | 25<br>22<br>22<br>29<br>3<br>51<br>51<br>15<br>21<br>21<br>21<br>21<br>37<br>56<br>56<br>53<br>53<br>51<br>51<br>51<br>51<br>51<br>51<br>51<br>51<br>51<br>51     | 50<br>31<br>14<br>2<br>17<br>15<br>14<br>9<br>22<br>59<br>31<br>4<br>3   | 22<br>13<br>33<br>4<br>64<br>13<br>47<br>12<br>25<br>47<br>19<br>6  | 38<br>49<br>32<br>15<br>46<br>53<br>46<br>33<br>33<br>38<br>5<br>5  | 69<br>74<br>60<br>19<br>41<br>32<br>44<br>35<br>41<br>100<br>49<br>6<br>4                   | 56<br>51<br>21<br>31<br>66<br>45<br>81<br>18<br>53<br>70<br>4<br>4<br>5<br>7                                   | 56<br>36<br>17<br>17<br>79<br>24<br>35<br>31<br>49<br>50<br>33<br>35<br>2   | 96<br>61<br>16<br>9<br>42<br>28<br>68<br>68<br>66<br>38<br>9<br>4  | 43<br>29<br>34<br>97<br>50<br>71<br>28<br>35<br>38<br>45<br>11<br>26<br>9                                       | 52<br>40<br>53<br>28<br>42<br>44<br>60<br>54<br>48<br>2<br>1   | 72<br>41<br>925<br>10<br>22<br>40<br>16<br>43<br>52<br>23<br>3  | 53<br>22<br>96<br>28<br>14<br>58<br>19<br>27<br>43<br>4<br>5<br>5<br>5                          | 634<br>434<br>286<br>342<br>522<br>390<br>470<br>374<br>483<br>701<br>354<br>79<br>52                                    |
|  | :   |  |   |   |   | Domestic   | disappearance   | 3/   |   |  |   |   |  |
| 1956<br>1957<br>1958<br>1959<br>1960<br>1961<br>1962<br>1963   | 97<br>88<br>86<br>85<br>59<br>102<br>101<br>108<br>108<br>114<br>114<br>109<br>109<br>109<br>109<br>109<br>109<br>109<br>109                                      | 95<br>113<br>91<br>100<br>109<br>108<br>108<br>132<br>113<br>146<br>158<br>95<br>69  | 136<br>138<br>134<br>130<br>88<br>141<br>133<br>151<br>152<br>163<br>186<br>116<br>103<br>104                   | 136<br>126<br>133<br>120<br>116<br>125<br>148<br>130<br>138<br>125<br>161<br>114<br>134                         | 116<br>104<br>106<br>72<br>105<br>136<br>94<br>110<br>115<br>162<br>163<br>97<br>113<br>105 | 136<br>135<br>129<br>120<br>124<br>172<br>95<br>134<br>132<br>145<br>179<br>111                                | 168<br>115<br>107<br>123<br>114<br>125<br>111<br>127<br>127<br>129<br>80<br>97  | 118<br>108<br>79<br>96<br>95<br>155<br>165<br>89<br>112<br>126<br>135<br>91<br>102                                       | 105<br>104<br>87<br>86<br>105<br>82<br>83<br>131<br>106<br>104<br>115<br>85<br>80<br>82                         | 117<br>120<br>80<br>80<br>111<br>113<br>109<br>96<br>103<br>110<br>118<br>101  | 79<br>90<br>71<br>90<br>145<br>104<br>105<br>108<br>106<br>98<br>91<br>74   | 73<br>94<br>83<br>29<br>92<br>98<br>83<br>79<br>122<br>103<br>89<br>98<br>66                    | 1,375 1,333 1,186 1,132 1,263 1,455 1,321 1,379 1,387 1,362 1,662 1,201 1,129 1,016                                      |
|  | Cents   | Cents  | Cents   | Pric<br>Cents   | e per pound<br>Cents  | crude, ta  | nk cars, f.o.<br>Cents  | b. Valley<br>Cents   | Cents   | Cents  | Cents   | Cents   | Cents  |
| 1955<br>1956<br>1957<br>1958<br>1959<br>1960<br>1961<br>1962<br>1963<br>1964<br>1964                             | : 12.24<br>: 12.28<br>: 12.84<br>: 11.58<br>: 11.57<br>: 10.10<br>: 13.60<br>: 10.90<br>: 10.31<br>: 10.50<br>: 10.50<br>: 11.85<br>: 11.85<br>: 11.85<br>: 11.85 | 11. 12<br>11. 75<br>12. 50<br>11. 29<br>10. 49<br>9. 34<br>13. 25<br>10. 47<br>9. 81<br>10. 16<br>10. 83<br>15. 16<br>11. 87<br>13. 06 | 11.19<br>13.30<br>12.47<br>10.97<br>9.50<br>9.58<br>11.97<br>10.50<br>10.48<br>10.72<br>11.03<br>13.25<br>11.09 | 10.88<br>13.72<br>13.64<br>11.22<br>9.09<br>9.98<br>12.20<br>10.03<br>10.16<br>11.59<br>11.56<br>13.08<br>11.00 | 11.19 13.94 14.44 10.80 8.88 10.03 12.75 9.91 9.34 12.12 11.85 11.44 10.50                  | 11.96<br>14.31<br>14.78<br>10.88<br>9.30<br>11.08<br>12.72<br>9.87<br>9.00<br>12.38<br>12.46<br>11.97<br>12.13 | 13.32<br>13.86<br>14.38<br>10.81<br>9.27<br>12.09<br>12.14<br>9.97<br>9.00<br>12.88<br>12.93<br>12.06<br>12.78<br>10.84 | 14.75<br>13.48<br>13.47<br>10.85<br>9.43<br>12.81<br>12.41<br>10.25<br>9.47<br>12.95<br>13.52<br>11.90<br>12.59<br>11.09 | 15.11<br>13.08<br>13.57<br>11.25<br>9.98<br>14.11<br>12.32<br>9.83<br>12.56<br>14.25<br>11.82<br>12.91<br>11.12 | 15.31<br>12.75<br>13.66<br>12.61<br>10.35<br>14.02<br>11.94<br>10.60<br>10.38<br>11.32<br>14.68<br>12.08<br>14.32<br>11.35 | 14.33<br>13.12<br>12.50<br>13.00<br>11.02<br>13.16<br>11.69<br>10.38<br>10.78<br>15.03<br>12.10<br>15.06<br>11.69 | 12.92<br>13.65<br>12.94<br>10.18<br>13.33<br>11.40<br>10.91<br>10.43<br>10.50<br>15.34<br>11.81 | 12.86<br>13.27<br>13.36<br>11.52<br>9.96<br>11.64<br>12.39<br>10.37<br>9.87<br>11.52<br>12.89<br>12.89<br>12.67<br>11.56 |

<sup>1/</sup> Preliminary. 2/ 1955-56 includes exports from CCC holdings that were not reported by Census. 1961-64 includes estimates of foreign donations not reported by Census. Beginning January 1965 includes shipments. 3/ Includes 17 million pounds imported in 1966, 5 million pounds in 1967, and 8 million pounds in 1968.

Table 23.--Cottonseed oil: Supply, disposition, oil equivalent of exports of cottonseed and price, 1958-69

|  | :_ |   | Su                     | ppl | 7   |   |   | : | Dispos  | sition  | : Cottonseed               | :   |
|--|----|---|------------------------|-----|---|---|---|---|---|---|----------------------------|---|
| Year<br>beginning<br>August                                | :  | Production  | Imports                | :   | Stocks,<br>Augúst 1                           | : | Total   | : | Exports<br>and<br>shipments   | Domestic<br>disap-<br>pearance                                  | : (oil : equivalent        | Price per pound Crude, Valley                       |
|  | :  | Mil. lb.  | Mil. lb.               |     | Mil. lb.                                      |   | Mil. lb.  |   | Mil. lb.  | Mil. lb.  | Mil. lb.                   | Cents   |
| 1958<br>1959<br>1960<br>1961<br>1962<br>1963<br>1964       |    | 1,518<br>1,861<br>1,808<br>1,865<br>1,942<br>1,981<br>1,999 | <br><br><br>           |     | 168<br>212<br>287<br>250<br>324<br>514<br>624 |   | 1,686<br>2,073<br>2,095<br>2,115<br>2,266<br>2,495<br>2,624 |   | 342<br>522<br><u>1</u> /390<br><u>1</u> /470<br><u>1</u> /374<br><u>1</u> /483<br>1/701 | 1,132<br>1,263<br>1,455<br>2/1,430<br>1,379<br>1,387<br>2/1,611 | 2<br>3<br>2<br>2<br>3<br>3 | 11.5<br>10.0<br>11.6<br>12.4<br>10.4<br>9.9<br>11.5 |
| 1965   | :  | 1,896   |                        |     | 421   |   | 2,317   |   | 348   | 1,668   | 3                          | 12.8  |
| 1966<br>1967<br>1968 <u>3</u> /<br><b>1</b> 969 <u>5</u> / | :  | 1,261<br>1,036<br>1,424<br>1,500                            | <u>4</u> /17<br>5<br>8 |     | 301<br>298<br>158<br>440                      |   | 1,579<br>1,338<br>1,590<br>1,940                            |   | 79<br>52<br>134   | 1,201<br>1,129<br>1,016<br>1,025                                | 2<br>1<br>1                | 12.9<br>12.7<br>11.6                                |

Includes estimates of foreign donations not reported by Census; beginning January 1965 foreign donations reported by Census. Includes estimates of foreign donations not reported by Census; beginning July Factory consumption figures used for years in which reported factory consump July Preliminary.

Includes 7 million pounds imported in July 1967 not shown in Census report.

Forecast, except stocks, August 1. Factory consumption figures used for years in which reported factory consumption exceeds domestic disappearance.

Table 24.--Cottonseed oil: Utilization, year beginning August, 1958-68

|  |  |     |  | Food uses   |   |   |   |  | : |  | N | lonfood use                             | s |   | : | Total  |
|--|--|-----|--|---|---|---|---|--|---|--|---|---|---|---|---|--|
| Year<br>beginning<br>August  | Shorten  | ing | Margarine  | Salad and cooking oils  | : | Other   | : | Total  | : | Foots<br>and<br>loss   | : | Other                                   | : | Total   | : | domestic<br>disap-<br>pearance   |
|  | Mil. l   |     | Mil. lb.   | Mil. lb.  |   | Mil. lb.  |   | Mil. lb.   |   | Mil. lb.   |   | Mil. lb.                                |   | Mil. lb.  |   | Mil. lb.   |
| 1958<br>1959<br>1960<br>1961<br>1962<br>1963<br>1964<br>1965<br>1966<br>1967 | 233<br>332<br>380<br>356<br>340<br>351<br>365<br>453<br>286<br>270 |     | 124<br>122<br>158<br>110<br>103<br>103<br>102<br>119<br>90<br>74<br>68 | 640<br>670<br>775<br>847<br>732<br>808<br>1,000<br>957<br>719<br>682<br>614 |   | 39<br>20<br>7<br>10<br>85<br>19<br>20<br>27<br>25 |   | 1,036<br>1,144<br>1,320<br>1,323<br>1,260<br>1,281<br>1,487<br>1,557<br>1,120<br>1,061 |   | 89<br>115<br>127<br>101<br>112<br>95<br>107<br>101<br>72<br>59<br>64 |   | 7<br>4<br>7<br>6<br>11<br>16<br>10<br>8 |   | 96<br>119<br>134<br>108<br>118<br>106<br>123<br>111<br>80<br>68 |   | 1,132<br>1,263<br>1,455<br>1/1,430<br>1,379<br>1,387<br>1/ 1,611<br>1,668<br>1,201<br>1,129<br>1,016 |

Factory consumption figures used for years in which reported factory consumption exceeds domestic disappearance. 1/ Factory cons 2/ Preliminary.

Table 25.--Cottonseed cake and meal: Supply, disposition and price, 1958-69

| Deginning August   Production   Imports   Aug. 1   Stocks,   Total   Exports   Feed and other uses 2/   disposition   41%  |         |       | S       | upply  |       | *     | Disposition |       | : Price : per tor |
|--|---------|-------|---------|--------|-------|-------|-------------|-------|-------------------|
| : 1,000  |         |       | Imports | Aug. 1 |       | and   | and other   |       | : Memphis,        |
| : 2,061 150 112 2,323 6 2,208 60.55 159 : 2,547 32 116 2,696 1147 2,359 2,506 55.65 160 : 2,504 43 190 2,738 57 2,538 2,595 55.10 161 : 2,506 72 1143 2,721 7 2,580 2,587 59.25 162 : 2,734 45 134 2,913 97 2,625 2,722 65.60 163 : 2,790 33 190 3,013 55 2,709 2,764 63.35 164 : 2,769 114 249 3,032 1145 2,719 2,864 59.90 165 : 2,725 42 168 2,935 110 2,700 2,810 68.80 166 : 1,801 59 134 1,994 9 1,838 1,847 78.55 167 : 1,450 47 1148 1,646 3 1,485 1,488 77.466 1,983 33 158 2,174 10 2,003 2,013 66.72  | :       | 1,000 | 1,000   | 1,000  | 1,000 | 1,000 | 1,000       | 1,000 |                   |
| 159     :     2,547     32     116     2,696     147     2,359     2,506     55.65       160     :     2,504     43     190     2,738     57     2,538     2,595     55.10       161     :     2,506     72     143     2,721     7     2,580     2,587     59.25       162     :     2,734     45     134     2,913     97     2,625     2,722     65.60       163     :     2,790     33     190     3,013     55     2,709     2,764     63.35       164     :     2,769     14     249     3,032     145     2,719     2,864     59.90       165     :     2,725     42     168     2,935     110     2,700     2,810     68.80       166     :     1,801     59     134     1,994     9     1,838     1,847     78.55       167     :     1,450     47     148     1,646     3     1,485     1,485     1,488     77.46       168     3/     :     1,983     33     158     2,174     10     2,003     2,013     66.76 |         |       | tons    | tons   | tons  | tons  | tons        | tons  | Dollars           |
| 160     :     2,504     43     190     2,738     57     2,538     2,595     55.16       161     :     2,506     72     143     2,721     7     2,580     2,587     59.25       162     :     2,734     45     134     2,913     97     2,625     2,722     65.60       163     :     2,790     33     190     3,013     55     2,709     2,764     63.35       164     :     2,769     14     249     3,032     145     2,719     2,864     59.90       165     :     2,725     42     168     2,935     110     2,700     2,810     68.80       166     :     1,801     59     134     1,994     9     1,838     1,847     78.55       167     :     1,450     47     148     1,646     3     1,485     1,488     77.46       168     3/     :     1,983     33     158     2,174     10     2,003     2,013     66.72  | 58      | 2,061 | 150     | 112    | 2,323 | 6     | 2,202       | 2,208 | 60.55             |
| 160     :     2,504     43     190     2,738     57     2,538     2,595     55.16       161     :     2,506     72     143     2,721     7     2,580     2,587     59.25       162     :     2,734     45     134     2,913     97     2,625     2,722     65.60       163     :     2,790     33     190     3,013     55     2,709     2,764     63.35       164     :     2,769     14     249     3,032     145     2,719     2,864     59.90       165     :     2,725     42     168     2,935     110     2,700     2,810     68.80       166     :     1,801     59     134     1,994     9     1,838     1,847     78.55       167     :     1,450     47     148     1,646     3     1,485     1,488     77.46       168     3/     :     1,983     33     158     2,174     10     2,003     2,013     66.72  | 959 :   | 2,547 | 32      | 116    |       | 147   | 2,359       | 2,506 | 55.65             |
| 2,506 72 143 2,721 7 2,580 2,587 59.25<br>662 : 2,734 45 134 2,913 97 2,625 2,722 65.60<br>663 : 2,790 33 190 3,013 55 2,709 2,764 63.35<br>664 : 2,769 14 249 3,032 145 2,719 2,864 59.90<br>665 : 2,725 42 168 2,935 110 2,700 2,810 68.80<br>666 : 1,801 59 134 1,994 9 1,838 1,847 78.55<br>667 : 1,450 47 148 1,646 3 1,485 1,488 77.40<br>668 3/ : 1,983 33 158 2,174 10 2,003 2,013 66.72   | 960 :   |       | 43      | 190    | 2,738 | 57    | 2,538       | 2,595 | 55.10             |
| 162     :     2,734     45     134     2,913     97     2,625     2,722     65.60       163     :     2,790     33     190     3,013     55     2,709     2,764     63.35       164     :     2,769     14     249     3,032     145     2,719     2,864     59.96       165     :     2,725     42     168     2,935     110     2,700     2,810     68.80       166     :     1,801     59     134     1,994     9     1,838     1,847     78.55       167     :     1,450     47     148     1,646     3     1,485     1,488     77.40       168     3     :     1,983     33     158     2,174     10     2,003     2,013     66.72  |         |       | 72      | 143    |       | 7     | 2,580       | 2,587 | 59.25             |
| 2,790 33 190 3,013 55 2,709 2,764 63.35<br>3,013 55 2,709 2,764 63.35<br>3,032 145 2,719 2,864 59.96<br>65 : 2,725 42 168 2,935 110 2,700 2,810 68.80<br>66 : 1,801 59 134 1,994 9 1,838 1,847 78.55<br>667 : 1,450 47 148 1,646 3 1,485 1,488 77.40<br>668 3/ : 1,983 33 158 2,174 10 2,003 2,013 66.76   |         |       | 45      | 134    | 2,913 | 97    |             | 2,722 | 65.60             |
| 164 : 2,769 14 249 3,032 145 2,719 2,864 59.90<br>165 : 2,725 42 168 2,935 110 2,700 2,810 68.80<br>1,801 59 134 1,994 9 1,838 1,847 78.55<br>1,450 47 148 1,646 3 1,485 1,488 77.40<br>1,668 3/ : 1,983 33 158 2,174 10 2,003 2,013 66.76   |         |       | 33      | 190    |       | 55    | 2,709       | 2,764 | 63.35             |
| 165 : 2,725  |         |       |         |        |       | 145   |             | 2,864 |                   |
| 1,801 59 134 1,994 9 1,838 1,847 78.55<br>167 : 1,450 47 148 1,646 3 1,485 1,488 77.40<br>168 3/ : 1,983 33 158 2.174 10 2.003 2.013 66.76   |         |       |         |        |       |       |             | 2,810 |                   |
| 67 : 1,450 47 148 1,646 3 1,485 1,488 77.40 68 3/ : 1,983 33 158 2,174 10 2,003 2,013 66.76  |         |       | 59      |        |       | 9     |             | 1,847 | 78.55             |
| 68 3/ : 1,983 33 158 2,174 10 2,003 2,013 66.76  |         |       |         | 148    |       | 3     | 1,485       | 1,488 | 77.40             |
| 69 4/ : 2,100 25 155 2,280 2,100   | 68 3/ : |       |         |        |       | 10    | , .         | ,     |                   |
|  | 69 4/   |       |         |        | 2,280 |       |             | _,-=3 |                   |

Stocks at crushing mills.
Includes small quantities of cottonseed meal used for fertilizer on farms of cotton growers. 1/ Stocks at crushing mills.
2/ Includes small quantities of cotton
3/ Preliminary.
4/ Forecast, except stocks, August 1.

soybean oil. Some former large users of cottonseed oil will pay little if any premium for cottonseed oil versus soybean oil. Lost oil markets are difficult to recapture.

In some countries, there is still some preference for cottonseed oil over soybean oil because of its desirable quality characteristics and historical use. This preference is declining in the United States.

As shown in figure 3, total edible vegetable oil use per person trended upward from 24 pounds in 1956 to 36 pounds in 1968, an increase of 50%. This gain parallels the growth in soybean oil usage, which climbed from 13 pounds

to 25 pounds. In sharp contrast, cottonseed oil use during 1956-68 fell from about  $7\frac{1}{2}$  pounds to  $4\frac{1}{2}$  pounds per person.

USDA announced in August 1969 that it will donate domestically about 53 million pounds of cottonseed oil products to needy families, charitable institutions and nonprofit school feeding programs (authorized by Section 416 of the Agricultural Act of 1949, as amended). Under the program, CCC engages in contracts for sale of its once-refined cottonseed oil (acquired from 1968-crop cottonseed) and the simultaneous purchase of equivalent quantities of packaged shortening (hydrogenated cottonseed oil) and salad oil.

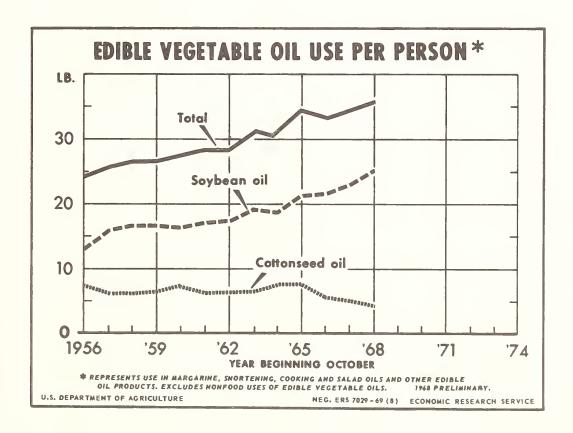


Figure 3

Table 26.--Cottonseed, cottonseed oil and cottonseed meal: U.S. exports by country of destination, 1965-68

|  |               |   |                       |   |   | Year beginning August                                       | ng August  |  |   |                 |               |               |
|--|---------------|---|-----------------------|---|---|---|--|--|---|-----------------|---------------|---------------|
| Country  |               | Cottonseed                              | seed                  |   |   | Cottonseed oil  | d oil  |  |   | Cottonseed meal | meal          |               |
| destination  | 1965          | 1966                                    | 1967                  | 1968  | 1965  | 1966  | 1967   | 1968   | 1965  | 1966            | 1967          | 1968          |
|  | 1,000<br>tons | 1,000<br>tons                           | 1,000<br>tons         | 1,000<br>tons                                   | 1,000<br>1bs.   | 1,000<br>1bs.   | 1,000<br>1bs.  | 1,000<br>1bs.                                | 1,000<br>tons   | 1,000<br>tons   | 1,000<br>tons | 1,000<br>tons |
| North Ame <u>rica:</u> Canada Mexico Nicaragua Other Total   | 2.0           | 0.1. 1. 0.0. 0.0. 0.0. 0.0. 0.0. 0.0. 0 | دن. ر<br>دن ر<br>دن ر | 1.00  | 46,713<br>35,557<br>4,412<br>86,682                                       | 8,114<br>30<br><br>2,965<br>11,109                          | 7,558<br>23<br>23<br>2,269<br>9,850                        | 14,935<br>1/<br>1,280<br>16,215              | 3.00.8  | 22126           | 5.3           | 25.1          |
| South America:<br>Columbia<br>Venezuela<br>Other<br>Total  | 2112          | aiair                                   | ડાં નાં મુ            | 1, 1/1  | 32,952<br>693<br>33,645   | 30,794<br>844<br>31,638                                     | 35,906<br>546<br>36,452                                    | 65,051<br>258<br>65,309                      | 1 1 7   |                 |               | -             |
| Western Europe: Belgium Denmark France Germany, West Ireland Italy Netherlands Norway Spain Swedn United Kingdom Other | 1,3           |   |                       | 111111111111111111111111111111111111111         | 550<br>7<br>7<br>8<br>55,990<br>2<br>7,492<br><br>6,724<br>6,724<br>1,771 | 24<br>8<br>8<br>19<br>623<br>623<br>1,333<br>1,317<br>5,150 | 6<br>10<br>385<br>385<br><br>69<br>69<br>69<br>67<br>1,025 | 10,047<br>10,047<br>10,047<br>6,125<br>62,62 | 2.1<br>64.7<br>10.9<br>2.4<br>13.7<br>2.2<br>3.8<br>3.8 | 3.5             |               | :             |
| Africa: Egypt Morrocco Other Total   | 0             | 1   77                                  | 1                     | 1 17  | 66,928<br>24,229<br>7,359<br>98,516                                       | 25,508<br>32<br>144<br>25,684                               | ∞  | 17,158                                       |   |                 |               |               |
| Asia<br>India<br>Iran<br>Japan<br>Pakistan<br>Turkey<br>Other  |               |   |                       | T     2   7   1   1   1   1   1   1   1   1   1 | 11,010<br>11,674<br>10,106<br>21,826<br>2,205<br>3,420<br>60,24,1         | 192<br>1,069<br>1,934<br>1,934                              | 1,852<br>01<br>1,852<br>6<br>252<br>1,155                  | 294<br>294<br>11<br>185<br>1,043<br>1,533    |   |                 |               | 7.4           |
| Grand Total  | 9.5           | 7.4                                     | 3.2                   | 3.9   | 351,656   | 76,776  | 50,610   | 131,849                                      | 104.2   | 8.0             | 3.1           | 10.1          |
| 1/ Less than 50 tons.  |               |   |                       |   |   |   |  |  |   |                 |               |               |

### Cottonseed Oil Export Prospects Improve With Lower Prices

Lower U.S. cottonseed oil prices along with increased availabilities point to increased commercial exports of cottonseed oil in 1969/70. Furthermore, CCC is offering cottonseed oil for export sale to certain countries. Thus, cottonseed oil exports during 1969/70 may increase sharply over the 132 million pounds shipped abroad last year.

USDA announced in August 1969 that it will offer for export sale about 100 million pounds of once-refined cottonseed oil (PBSY grade--prime, bleachable, summer yellow) from its inventory on a competitive bid basis to Latin American countries, Japan, Hong Kong, UAR (Egypt), Israel and Iran. Additional quantities may be offered. As of September 26, CCC had sold 56 million pounds (PBSY) under the program at an average price of 9.3¢ per pound at port positions. On August 1, 1969, CCC owned about 310 million pounds of cottonseed oil acquired under the 1968 price-support program. Most of this quantity is once-refined oil (PBSY), which was originally tendered and accepted as crude oil by CCC, but delivered as refined. The refining loss for cottonseed oil averages about 6%.

U.S. exports of cottonseed oil dropped sharply from a record 701 million pounds in the 1964/65 marketing year to only 51 million in 1967/68. Lately, South America has been the major foreign market. In earlier years, Western Europe was the major taker--before this market was lost to other competitive

edible oils such as sunflower, soybean, and peanut (table 26).

Cottonseed oil prices (crude, f.o.b. Valley points) during the 1968/69 marketing year averaged 11½ per pound, about a cent less than the year before. Prices at the beginning of the marketing year were quite high (16.4½ in August 1968) reflecting the low carryover of cottonseed oil from the previous year's short crop. When the 1968 crop oil was available in volume, prices dropped sharply to 10.4½ in October, and CCC started accepting oil tenders under the support program. Prices then gradually increased, reaching 11.7½ in June 1969.

Prices of cottonseed oil in August 1969, the first month of the current marketing year, were 10.9¢ per pound, about  $5\frac{1}{2}$ ¢ below a year earlier. When the crushings of new-crop cottonseed pick up in volume -- usually peaking in October -prices are expected to decline seasonally and probably will average somewhat below the  $10\frac{1}{2}$ ¢ level of October-December 1968. Increased supplies and lower support prices for 1969-crop cottonseed will put pressure on cottonseed oil prices in 1969/70. While cottonseed oil prices likely will average lower in 1969/70 than last year, they probably will not drop to the level of soybean oil prices. The prospective 1969/70 supply and demand situation for cottonseed oil indicates that CCC purchases may be necessary to maintain reasonable operating margins to the crusher.

## Price Premium of Cottonseed Oil Over Soybean Oil to Narrow This Year

Wholesale prices of the major food fats--soybean oil, cottonseed oil, and lard--generally move together. Usually their relationships to each other tend to vary within a narrow range. This reflects primarily the high degree of

substitution and interchangeability of the 3 fats in manufactured food products. When 1 of the 3 gets out of line with the other 2 in the general price structure, manufacturers who use that fat switch to a lower priced substitute fat as much as feasible.

Table 27 .--Soybean and cottonseed: Comparison of oil and meal prices, 1950 to date

| Year                     | (          | oil price per p    | ound           | N               | Meal price per      | ton                |
|--------------------------|------------|--------------------|----------------|-----------------|---------------------|--------------------|
| beginning :<br>October : | oil        | : Cottonseed : oil | :Differential: | Soybean<br>meal | : Cottonseed : meal | :<br>:Differential |
|                          |            | : 2/<br>Cents      | Cents          | l/<br>Dollars   | : 2/<br>Dollars     | Dollars            |
| 4                        |            |                    |                |                 |                     | 202200             |
| 1950 :                   | • •        | 19.9               | +2.1           | 64.45           | 70.35               | + 5.90             |
| 1951 :                   |            | 12.7               | +1.4           | 83.35           | 81.95               | - 1.40             |
| 1952 :                   |            | 14.1               | +2.0<br>0      | 67.55<br>78.65  | 66.65<br>63.35      | 90<br>-15.30       |
| 1953 :                   |            | 13.5<br>12.8       | +0.9           | 60.70           | 60.75               | + .05              |
| 1954 :<br>1955 :         |            | 12.9               | + .4           | 52.55           | 51.35               | - 1.20             |
| 1956                     |            | 13.4               | + .7           | 47.45           | 51.70               | + 4.25             |
| 1957 :                   | - 0        | 13.2               | +2.4           | 53.40           | 56.50               | + 3.10             |
| 1958 :                   |            | 11.5               | +2.0           | 55.80           | 59.45               | + 3.65             |
| 1959                     | ^ -        | 9.7                | +1.4           | 55.55           | 56.25               | + .70              |
| -979                     |            |                    |                |                 |                     |                    |
| 1960 :                   |            | 12.3               | +1.0           | 60.60           | 56.15               | - 4.45             |
| 1961 :                   |            | 11.9               | +2.4           | 63.60           | 59.20               | - 4.40             |
| 1962 :                   |            | 10.3               | +1.4           | 71.30           | 66.90               | - 4.40<br>- 8.80   |
| 1963 :                   |            | 9.9                | +1.4           | 71.00<br>70.20  | 62.20<br>59.80      | -10.40             |
| 1964 :                   |            | 11.6               | + •3           |                 | 72.40               | - 9.10             |
| 1965 :                   |            | 13.7               | +1.9           | 81.50<br>78.80  | 77.50               | - 1.30             |
| 1966 :                   |            | 12.2               | +2.1<br>+4.8   | 76.90           | 77.40               | + .50              |
| 1967 :                   | 8.4<br>8.4 | 13.2               | +2.5           | 74. <b>00</b>   | 64.85               | - 9.15             |
| 1968 3/                  | 0.4        | 10.9               | TC•7           | 14.00           | 04.07               | 3.13               |
| Average                  |            |                    |                |                 |                     |                    |
| 1950-68 :                | 11.0       | 12.6               | +16            | 66.75           | 63.95               | - 2.80             |
| Months:                  |            |                    |                |                 |                     |                    |
| <u>1967/6</u> 8          |            |                    |                |                 |                     |                    |
| October :                | 8.8        | 11.1               | +2.3           | 71.80           | 76.10               | + 4.30             |
| November :               | 0 /        | 11.0               | +2.4           | 71.90           | 76.60               | + 4.70             |
| December :               | 8.6        | 11.4               | +2.8           | 73.40           | 78.10               | + 4.70             |
| January :                | ^          | 12.1               | +3.4           | 75.10           | 77.90               | + 2.80             |
| February :               |            | 12.9               | +3.4           | 74.50           | 77.60               | + 3.10             |
| March :                  | 9.1        | 12.6               | +3.5           | 75.00           | 76.20               | + 1.20             |
| April :                  | 8.8        | 12.9               | +4.1           | 74.60           | 77.00               | + 2.40             |
| May                      | 8.7        | 14.3               | +5.6           | 75.00           | 77.60               | + 2.60             |
| June :                   |            | 15.1               | +7.3           | 79.50           | 78.20               | - 1.30             |
| July :                   | 7.4        | 15.1               | +7.7           | 82.80           | 78.20               | - 4.60<br>- 6.40   |
| August :                 |            | 16.4               | +8.9           | 84.40           | 78.00               | /                  |
| September :              | 7.5        | 13.1               | +5.6           | 85.10           | 79.10               | - 6.00             |
| <u> 1968/69</u> :        |            | = 0.1:             | . 2. 3         | 79 00           | 66.20               | -12.00             |
| October :                | 7.3        | 10.4               | +3.1           | 78.20<br>73.50  | 65.60               | - 7.90             |
| November :               | 7.9        | 10.6               | +2.7<br>+2.4   | 71.60           | 67.80               | - 3.80             |
| December :               | 8.1        | 10.5               |                | 69.80           | 68.40               | - 1.40             |
| January :                | 8.6        | 10.5               | +1.9<br>+1.9   | 69.90           | 64.60               | - 5.30             |
| February                 | 8.9        | 10.8               | +2.3           | 72.60           | 62.50               | -10.10             |
| March                    | 8.8<br>8.4 | 11.1<br>11.2       | +2.8           | 73.30           | 61.70               | -11.60             |
| April                    | 8.4        | 11.4               | +3.0           | 76.10           | 59.10               | -17.00             |
| May                      | 8.4        | 11.7               | +3.3           | 77.50           | 59.60               | -17.90             |
| •                        |            |                    |                |                 |                     |                    |
| June                     |            | 11 2               | +3.0           | 77.30           | 00.00               | - 9.30             |
| June<br>July             | 8.2        | 11.2               | +3.0<br>+2.0   | 77.30<br>76.90  | 68.00<br>71.00      | - 5.90             |
| June<br>July<br>August   | 8.2        | 11.2               | +3.0<br>+2.0   | 77.30<br>76.90  |                     |                    |

1/ Soybean oil, crude, Decatur; soybean meal, bulk, 44% protein, Decatur. 2/ Cottonseed oil, crude, Valley; cottonseed meal, bulk, 41% protein, Memphis. 3/ Preliminary.

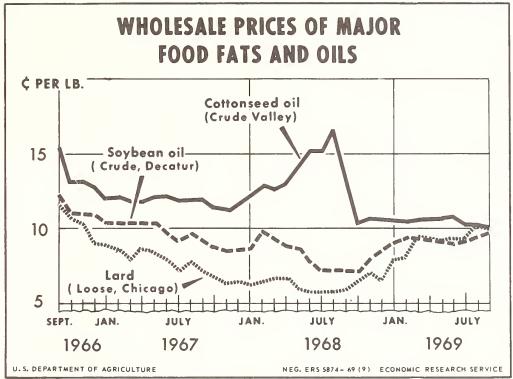


Figure 4

The price premium of cottonseed oil over soybean oil during 1950-68 averaged 1.6¢ per pound. It varied from zero in 1953 to 4.8¢ in 1967/68 (table 27). During 1967/68, when cottonseed oil was in short supply, the monthly differential increased from 2.3¢ in October 1967 to 8.9¢ in August 1968. In the 1968/69 marketing year, the monthly price spread declined and remained

relatively steady, averaging nearly 3.0¢ per pound.

Cottonseed oil prices are expected to average 1/2 to 2/2 per pound above soybean oil in the 1969/70 marketing year. This would be near the historical price relationships and somewhat smaller than in 1968/69. The market price differential on August 1, 1969, was 2.2/2 but narrowed in September.

### Increased Cottonseed Meal Use This Year

Total supply of cottonseed cake and meal for the marketing year started August 1, 1969, is estimated at 2.3 million tons, about 5% more than in 1968/69 (table 25). Domestic use is forecast at 2.1 million tons, about 4% more than last year. Cottonseed meal is used largely for feeding ruminant animals. With low production in 1966/68 it lost ground to urea as well as fish meal in some areas. But with lower prices this marketing year, cottonseed meal will be more competitive. Furthermore, high-protein consuming animal units will be more numerous in 1969/70--

some 2 to 3% more than last year. Cotton-seed meal exports dropped from 145,000 tons in 1964/65 to 3,100 tons in 1967/68 and 10,100 in 1968/69 (table 26). Exports are expected to increase during 1969/70 mainly because of lower U.S. meal prices.

The CCC acquired about 144,000 tons of cottonseed meal under the 1968-crop price support program. The bulk of this was in California, Arizona, Oklahoma, and West Texas. The Corporation has sold nearly two-thirds of its inventory to date--17,000 ton into export at \$45 per

Table 28.--Cottonseed cake and meal: Supply, disposition and price, by months, crop years 1955-69

|  |   |   |  |  |  | Produc  |  |  |  |  |  |  |   |
|--|---|---|--|--|--|---|--|--|--|--|--|--|---|
| Year<br>begin-<br>ning<br>August   | Aug.  | Sept.   | Oct.   | Nov.   | Dec.   | Jan.  | Feb.   | Mar.   | Apr.   | May  | June   | July   | Total<br>or<br>Average  |
|  | 1,000<br>tons   | 1,000<br>tons   | 1,000<br>tons  | 1,000<br>tons  | 1,000<br>tons  | 1,000<br>tons   | 1,000<br>tons  | 1,000<br>tons  | 1,000<br>tons  | 1,000<br>tons  | 1,000<br>tons  | 1,000<br>tons  | 1,000<br>tons   |
| 1955<br>1956<br>1957<br>1958<br>1959<br>1960<br>1961<br>1962<br>1963<br>1964<br>1965<br>1966<br>1967<br>1968 1/      | 71.0<br>69.4  | 233.3<br>249.0<br>167.3<br>135.1<br>227.1<br>189.3<br>149.6<br>237.9<br>224.1<br>181.9<br>191.0<br>101.2<br>49.1<br>54.5      | 328.5<br>346.8<br>300.8<br>328.6<br>360.2<br>352.2<br>339.7<br>350.7<br>346.3<br>316.9<br>297.9<br>237.7<br>141.4<br>231.5 | 370.6<br>328.6<br>281.3<br>280.4<br>336.7<br>345.7<br>342.9<br>366.1<br>353.7<br>339.0<br>338.4<br>259.9<br>229.0<br>240.3 | 317.2<br>275.1<br>247.5<br>260.3<br>303.5<br>286.8<br>302.2<br>304.8<br>325.0<br>332.8<br>249.2<br>196.8<br>246.7          | 320.7<br>293.3<br>238.8<br>252.3<br>289.8<br>309.8<br>309.1<br>327.2<br>326.5<br>315.4<br>333.4<br>237.6<br>198.0<br>255.3          | 287.7<br>238.9<br>187.5<br>201.8<br>267.5<br>247.4<br>268.5<br>294.8<br>292.8<br>284.0<br>305.4<br>179.1<br>161.6<br>215.9 | 230.0<br>192.4<br>149.7<br>195.2<br>246.7<br>224.9<br>242.6<br>257.5<br>259.1<br>295.3<br>287.6<br>184.0<br>140.2<br>201.0         | 179.4<br>136.4<br>117.3<br>151.5<br>175.8<br>189.3<br>192.1<br>197.1<br>212.9<br>222.7<br>197.4<br>106.8<br>174.9        | 123.1<br>113.0<br>81.4<br>85.9<br>116.9<br>138.1<br>130.9<br>138.3<br>165.1<br>181.9<br>157.3<br>63.3<br>73.8<br>155.0     | 74.4<br>73.1<br>55.7<br>55.1<br>83.0<br>85.0<br>99.9<br>86.6<br>116.7<br>126.1<br>109.3<br>67.5<br>47.8<br>106.8           | 62.3<br>58.5<br>59.5<br>45.3<br>70.0<br>66.6<br>85.2<br>72.0<br>87.3<br>98.9<br>72.2<br>44.2<br>39.1                       | 2,630.6<br>2,390.3<br>1,958.0<br>2,060.8<br>2,547.3<br>2,504.4<br>2,505.9<br>2,733.6<br>2,790.3<br>2,790.3<br>2,7694.6<br>1,801.3<br>1,450.5<br>1,985.0 |
| 1955<br>1956<br>1957<br>1958<br>1959<br>1960<br>1961<br>1962<br>1963<br>1964<br>1965<br>1966<br>1967 <u>1</u> /      | 116.3<br>189.9<br>142.6<br>133.9<br>190.4   | 169.7<br>120.3<br>210.1<br>78.4<br>87.8<br>157.7<br>89.4<br>95.2<br>156.6<br>171.5<br>110.8<br>99.5<br>133.2<br>127.4<br>98.5 | 150.2<br>140.9<br>209.7<br>71.2<br>97.0<br>137.1<br>73.3<br>99.9<br>159.8<br>138.8<br>77.7<br>64.1<br>104.9                | 170.7<br>170.8<br>249.9<br>116.1<br>110.8<br>167.9<br>96.7<br>94.9<br>169.8<br>137.4<br>91.0<br>89.6<br>121.6              | 173.7<br>186.1<br>262.4<br>106.7<br>113.1<br>199.7<br>8 100.8<br>195.6<br>159.9<br>96.1<br>91.7<br>137.1                   | 163.0<br>188.2<br>247.2<br>78.5<br>110.4<br>197.8<br>81.5<br>100.5<br>188.0<br>126.8<br>80.9<br>94.2<br>146.7<br>135.1              | 191.5<br>195.1<br>241.9<br>79.6<br>131.6<br>227.2<br>84.9<br>107.2<br>207.5<br>150.6<br>94.6<br>111.6<br>161.8             | 220.2<br>228.6<br>224.7<br>103.8<br>149.5<br>239.6<br>113.6<br>123.2<br>241.4<br>177.0<br>115.0<br>126.1<br>168.1                  | 250.7<br>264.4<br>198.0<br>139.8<br>140.8<br>272.0<br>123.4<br>149.6<br>2592.7<br>156.7<br>148.1<br>170.6<br>163.5       | 258.4<br>280.1<br>189.8<br>166.4<br>188.9<br>270.5<br>156.9<br>200.3<br>295.7<br>220.7<br>189.6<br>166.9<br>192.4          | 245.7<br>293.8<br>182.7<br>170.5<br>204.5<br>245.5<br>164.0<br>220.4<br>325.6<br>238.5<br>212.5<br>160.9<br>200.5<br>215.5 | 214.8<br>288.4<br>162.2<br>153.7<br>202.8<br>196.9<br>155.7<br>214.0<br>305.0<br>207.6<br>170.1<br>157.8<br>188.9          |   |
| 1955   |   | 24.1  | 52.8   | 35.6   | 28.3   | Exports<br>15.3   | 4.9  | 3.6  | 2.8  | 3.7  | 2.5  | 1.2  | 195.6   |
| 1956<br>1957<br>1958<br>1959<br>1960<br>1961<br>1962<br>1963<br>1964<br>1965<br>1966<br>1967<br>1968<br>1968<br>1969 | 4.7<br>5.8  | 3.1<br>2.8<br>.2<br>17.4<br>9.2<br>2.1<br>16.6<br>8.6<br>4.3<br>5.3<br>1.0<br>2/  | 5.2<br>.2<br>.3<br>39.6<br>15.1<br>12.4<br>14.8<br>12.7<br>23.7<br>4.8   | 7.3<br>5.4<br>.1<br>18.2<br>11.3<br>1.8<br>14.4<br>3.8<br>28.2<br>25.2<br>.1   | 10.2<br>.1<br>3.7<br>34.1<br>3.6<br>.2<br>10.6<br>5.2<br>18.8<br>12.9<br>.4  | 2.7<br>.1<br>.5<br>23.1<br>2.2<br>.2<br>.2<br>.3<br>3.0<br>8.5<br>.1  | .7<br>.1<br>3.0<br>2.7<br>2/<br>17.7<br>.4<br>.5<br>9.6<br>.2<br>.1  | .3<br>.1<br>1.6<br>1.3<br>.1<br>6.2<br>4.1<br>14.2<br>9.1<br>.3  | .3<br>.2<br>.2<br>.3.1<br>.4<br>.2<br>7.4<br>.2<br>9.3<br>10.5<br>.5<br>.5   | 2/<br>.2<br>.1<br>.4<br>.6<br>.1<br>4.5<br>7.3<br>13.0<br>.6<br>.2/<br>3.3   | .2<br>2/<br>1.3<br>.4<br><br>.1<br>2.2<br>16.9<br>.1<br>.1   | .2<br>.1<br>.8<br>4.7<br>.1<br>1.0<br>6.2<br>18.6<br>.3<br>.3  | 32.0<br>9.9<br>5.6<br>147.3<br>57.3<br>6.9<br>97.3<br>55.1<br>144.9<br>108.9<br>8.6<br>3.3  |
| 1957<br>1958<br>1959<br>1960<br>1961<br>1962<br>1963<br>1964<br>1965<br>1966<br>1967                                 | : 116.0<br>: 94.3<br>: 95.9<br>: 121.3<br>: 140.9<br>: 134.7<br>: 155.5<br>: 129.5<br>: 109.6                                       | 232.0<br>231.7<br>168.9<br>153.6<br>202.0<br>201.5<br>166.4<br>218.8<br>214.6<br>211.0<br>222.4<br>139.4<br>81.5<br>76.3      | 258.7<br>318.7<br>265.5<br>297.2<br>309.8<br>309.1<br>321.6<br>346.3<br>324.5<br>306.5<br>265.3<br>211.1<br>128.1<br>211.8 | 333.4<br>311.5<br>266.0<br>301.6<br>319.1<br>305.2<br>361.8<br>350.4<br>327.2<br>288.5<br>309.2<br>262.2<br>219.0<br>227.8 | 302.6<br>265.3<br>267.5<br>296.6<br>276.9<br>290.8<br>301.7<br>293.7<br>310.3<br>339.4<br>337.9<br>251.9<br>191.3<br>260.4 | 280.9<br>280.9<br>286.7<br>248.2<br>266.6<br>248.3<br>283.4<br>306.4<br>323.7<br>311.7<br>288.9<br>314.0<br>227.0<br>186.7<br>251.9 | 257.1<br>210.7<br>207.7<br>196.8<br>250.5<br>237.1<br>247.6<br>264.5<br>263.6<br>257.4<br>277.9<br>170.8<br>159.4<br>191.9 | 3/4/<br>200.7<br>161.2<br>180.5<br>173.6<br>260.2<br>192.7<br>241.8<br>225.0<br>238.9<br>266.8<br>241.1<br>169.0<br>141.6<br>205.4 | 174.2<br>125.2<br>130.1<br>139.3<br>127.9<br>195.0<br>162.6<br>144.0<br>180.0<br>186.5<br>159.4<br>92.5<br>89.8<br>148.6 | 138.5<br>104.0<br>91.9<br>92.0<br>102.8<br>168.2<br>125.2<br>120.3<br>129.2<br>152.5<br>138.4<br>72.8<br>68.5<br>130.7     | 109.2<br>83.4<br>80.7<br>81.6<br>84.5<br>138.1<br>113.0<br>97.8<br>137.1<br>143.8<br>155.4<br>74.4<br>62.2<br>138.4        | 118.7<br>100.6<br>119.2<br>86.6<br>82.4<br>120.8<br>110.5<br>99.8<br>136.4<br>122.9<br>112.7<br>56.8<br>72.3<br>95.0       | 2,525.0<br>2,334.4<br>2,140.0<br>2,201.5<br>2,358.7<br>2,537.8<br>2,579.9<br>2,625.2<br>2,709.1<br>2,720.0<br>2,663.2<br>1,837.5<br>1,484.8<br>2,004.9  |
|  | Dol.  | Dol.  | Dol.   | Dol.   | Price per Dol.   | Dol.  | . Memphis.<br>Dol.   | 41% prot   | Dol.   | Dol.   | Dol.   | Dol.   | Dol.  |
| 1956<br>1957<br>1958<br>1959<br>1960<br>1961<br>1962<br>1963   | 56.40<br>59,60<br>54.90<br>61.00<br>51.25<br>57.70<br>64.70<br>62.80<br>70.00<br>62.50<br>64.40<br>88.00<br>76.20<br>78.00<br>71.00 | 53.25<br>50.60<br>50.45<br>55.10<br>51.80<br>52.60<br>58.25<br>59.80<br>68.60<br>62.80<br>59.90<br>79.70<br>79.20<br>79.10    | 51.60<br>52.00<br>47.50<br>52.00<br>58.40<br>52.75<br>53.50<br>61.50<br>67.70<br>62.00<br>59.10<br>75.10<br>66.20          | 50.00<br>53.60<br>49.20<br>57.75<br>62.85<br>52.50<br>59.90<br>68.20<br>70.00<br>60.90<br>61.90<br>80.90<br>76.60<br>65.60 | 52.75<br>54.20<br>52.80<br>64.40<br>60.30<br>52.25<br>62.90<br>68.80<br>70.20<br>61.20<br>66.60<br>83.20<br>78.10<br>67.80 | 52.50<br>53.95<br>53.80<br>69.50<br>57.90<br>51.80<br>63.80<br>68.60<br>69.00<br>60.20<br>69.50<br>81.60<br>77.90<br>68.40          | 49.10<br>52.25<br>56.50<br>62.90<br>53.50<br>52.25<br>59.00<br>68.80<br>63.80<br>59.00<br>71.70<br>76.20<br>77.60<br>64.60 | 46.90<br>51.05<br>59.60<br>60.60<br>56.00<br>52.10<br>58.00<br>66.10<br>60.60<br>56.90<br>68.60<br>75.70<br>76.20<br>62.50         | 47.75<br>50.90<br>59.65<br>60.60<br>54.35<br>55.60<br>61.50<br>57.90<br>56.00<br>69.90<br>75.00<br>77.00<br>61.70        | 50.20<br>48.10<br>59.45<br>59.40<br>52.40<br>58.50<br>55.80<br>64.50<br>52.10<br>54.10<br>71.00<br>76.30<br>77.60<br>59.10 | 50.25<br>48.50<br>59.90<br>59.30<br>53.60<br>60.60<br>58.60<br>66.80<br>53.90<br>59.60<br>72.70<br>76.50<br>78.20<br>59.60 | 54.75<br>50.55<br>63.20<br>64.15<br>55.35<br>62.75<br>60.10<br>69.80<br>56.20<br>63.50<br>90.00<br>74.50<br>78.20<br>68.00 | 51.30<br>52.10<br>55.60<br>60.55<br>55.65<br>55.10<br>59.25<br>65.60<br>63.35<br>59.90<br>68.80<br>78.55<br>77.40<br>66.72                              |

<sup>1/</sup> Preliminary. 2/ Less than 50 tons. 3/ Includes imports which average 45,000 tons per year. 4/ Beginning January 1965 includes shipments.

ton and 76,000 tons for unrestricted use at \$57 per ton.

Cottonseed meal (41% protein, Memphis) historically has sold at a \$3 per ton discount to soybean meal (44% protein Decatur), during 1950-68 (table 27). During the 1968/69 marketing year,

the differential widened and cottonseed meal sold for \$9 per ton under soybean meal. Cottonseed meal prices dropped from \$79 per ton in September 1968 to \$59 in May 1969, then rose to \$68 in July. The average for the entire 1968/69 season was \$65 per ton, \$13 below the year before.

### CCC Price Support Program

The 1969-crop cottonseed price support to producers, at \$37 per ton, basis (100) grade, is carried out primarily by means of a product purchase program. This is done through oil mills which agree to pay not less than the equivalent support price of \$41 per ton for cottonseed at the gins -- thus providing the gins \$4 per ton as cottonseed's share of the ginners' fee. Tenders from participating oil mills may be offered through July 1970 or a later date approved by CCC. The Corporation has standby authority to purchase eligible cottonseed directly from producers and ginners in areas where such purchases are deemed necessary to make the support program effective.

If a participating crusher cannot recover his cottonseed costs (\$41 per ton f.o.b. gin) plus a reasonable operating margin, CCC stands ready to

purchase products at prices that will yield such a reasonable return. The calculation includes the price and outturns of linters and hulls as well as the oil and meal. A crusher may tender to CCC crude or once-refined (PBSY) cottonseed oil. While CCC has the option to accept tenders on cottonseed meal (41% protein) in 1969/70, the program is intended to operate primarily through oil. If a tender price is not acceptable to CCC, the Corporation may make a counteroffer. Each lot of cottonseed oil or meal purchased by CCC is delivered by the crusher f.o.b. cars or trucks (CCC's option) made available without cost to the crusher at the oil mill. Delivery of the oil is required not later than 180 days after the date of sale. No delivery of 1969-crop oil or meal will be made after August 31, 1970. unless a later date is mutually agreed upon.

#### CCC Oil and Meal Purchases Heavy Last Season

CCC price support operations during 1968/69 for cottonseed oil and meal are summarized in tables 29 and 30. Here are some of the highlights of the season.

CCC purchased 331 million pounds of cottonseed oil (292 million as crude and 39 million refined) and 287 million pounds of cottonseed meal (total acceptances were 382 million pounds but 95 million were withdrawn). The average CCC acceptance price for crude cottonseed oil was 10.8¢ per pound, oncerefined oil, 11.9¢, and cottonseed meal, \$64.60 per ton.

The Southwest and West accounted for 59% of the cottonseed oil acquired by CCC and the Valley area the remaining 41%. There were no acquisitions of oil or meal from the Southeast. Texas alone accounted for a third of all CCC purchases of oil and Mississippi for about a fifth. In the case of cottonseed meal, California, Arizona and Texas each furnished about 30% to the CCC acquisitions during the year. Only small quantities of meal were tendered and accepted in the Valley.

The peak month for CCC oil purchases was November 1968, when 79 million pounds or nearly a fourth of the year's total

Table 29,--Cottonseed oil: Summary of CCC acceptances under the 1968-2rop Cottonseed Price Support Program, by months and States

|                        | otal       | Average<br>price 1/<br>Cents per<br>pound     | 10.25<br>10.26<br>10.38<br>10.67<br>10.67<br>11.12<br>11.16<br>10.44                          | 10.74  | Total  | Average<br>price 1/<br>Cents per                                | 10.61<br>10.53<br>10.44<br>10.86<br>11.00<br>11.00<br>11.38<br>10.94                                       | 10.84  |
|------------------------|------------|---|---|--|--------|---|--|--|
|                        | Area Total | Quantity 1,000 pound                          | 600<br>10,280<br>11,565<br>9,000<br>30,310<br>118,817<br>11,830<br>22,027<br>12,027<br>18,615 | 1 <b>%6</b> ,074<br>163,319<br>32,755        | u.s.   | Quantity:   | 6,600<br>78,830<br>70,1015<br>39,690<br>76,690<br>77,690<br>77,690<br>77,690<br>77,690<br>77,690<br>77,690 | 330,508<br>291,753<br>38,755                 |
|                        | ••         | Average : price 1/ : Cents per pound          | 10.27<br>10.27<br>10.75<br>10.75<br>11.36<br>11.36  | 10.84  |        | 음   | 10.70<br>10.74<br>10.58<br>10.97<br>11.125<br>11.11<br>11.13<br>11.72                                      | 10.94  |
|                        | Texas      | Quantity: 1,000 pound                         | 21,080<br><br>2,700<br>7,620<br>21,570<br>13,320<br>22,750<br>12,415<br>10,265                | 111,720<br>90,110<br>21,610                  |        | Quan  | 1 .  | 134,434 128,434 6,000                        |
|                        | ••••       |   |   |  |        | Tennessee 11. Average 17. OO Cents per                          | 3/11.67<br>3/11.67<br>10.89<br>10.89   | 10.89  |
|                        | 0klahoma   | : Average<br>: price 1/<br>Cents per<br>pound | 10.375<br>10.375<br>10.375<br>11.00<br>11.00<br>11.20<br>11.47                                | .10.99                                       |        | Tenno<br>Quantity<br>1,000                                      | 3/6,000  | 6,900  |
| d Far West             | Ok.        | Quantity<br>1,000<br>pound                    | 750<br>750<br>1,627<br>1,980<br>3,162<br>900<br>1,980   | 16,519<br>8,389<br>8,130                     |        | Average price 1/  | 10.75<br>10.70<br>10.50<br>10.94<br>11.125<br>11.75  | 10.81  |
| Southwest and Far West | ico        | Average<br>price 1/<br>Cents per<br>pound     | 10.25   | 10.44  | ey     | 8   | 300 3,450 3.00 1,710 1,710 150 1150 1150 1150 1150 1150 1150 11  | 6,450  |
| ν.                     | New Mexico | Quantity :<br>1,000<br>pound                  | 2,100<br>1,200<br>1,200<br>1,800<br>7790  | 4,570<br>4,570                               | Valley | Mississippi<br>tity: Average<br>tity: price 1/<br>000 Cents per | 10.67<br>10.67<br>10.67<br>11.05<br>11.125<br>11.39<br>11.69   | 11.02  |
|                        |            | Average :<br>price 1/ :<br>Cents per          | 10.375  | <br>10.85<br>11.81                           |        | Missi<br>Quantity<br>1,000                                      | 14,730<br>16,150<br>11,730<br>11,730<br>6,600<br>8,130<br>2,464  | 69,334                                       |
|                        | California |   |   |  |        | lana Average price 1/ Cents per                                 | 10.67<br>10.73<br>10.79<br>11.125<br>11.125<br>11.140  | 11.02  |
|                        |            | Quantity<br>1,000<br>pound                    | 2,415<br>6,300<br>1,800<br>1,800  | 15,765<br>12,750<br>3,015                    |        | uis.  | 3,300<br>1,650<br>1,650<br>3,750<br>3,650<br>1,650<br>1,650  | 23,820<br>23,820<br>                         |
|                        | Arizona    | : Average<br>: price 1/<br>Cents per<br>pound | 10.25<br>10.25<br>10.46<br>10.56<br>11.00<br>11.00<br>11.00                                   | 10.59  |        | verage:<br>ice 1/:<br>nts per                                   | 10.72<br>10.79<br><br>10.98<br>11.125<br>11.15<br>11.375   | 10.97  |
|                        | Ari        | Quantity<br>1,000<br>pound                    | 600<br>17,100<br>7,500<br>3,750<br>3,900<br>7,800<br>1,200<br>5,650                           | 47,500<br>47,500                             |        | 1 2 1   | 1,800<br>9,720<br>9,720<br>6,450<br>6,450<br>3,750   | 27,930<br>27,930<br>                         |
| × •• •                 | and        |   | 1968/69 October November December January March April May June June June June September       | Total<br>Crude oil:<br>Once-re-<br>fined 2/: |        | .'''  | 1968/69 October November December January February March April May June July August September              | Total<br>Crude oil:<br>Once re-<br>fined 2/: |

1/ Crude oil unless otherwise specified. Price is f.o.b. crushers' mills. 2/ PBSY (prime, bleachable, summer yellow). 3/ Once-refined.

Table 30. -- Cottonseed Meal: Summary of CCC acceptances under the 1968-crop Cottonseed Price Support Program, by months and States

|            | ••             |                    |                      |                    |                | ,                    |                  |                      |                |                                 |
|------------|----------------|--------------------|----------------------|--------------------|----------------|----------------------|------------------|----------------------|----------------|---------------------------------|
| Year       | Ari            | Arizona            | California           | ornia              | OKT            | 0klahoma             | Te               | Texas                | Area           | Total                           |
| Month      |                | Average price 1/   | Quantity             | Average price 1/   | Quantity       | : Average : price l/ | Quantity         | : Average : price 1/ | Quantity       | : Average : price 1/            |
| 05/870     | 1,000<br>pound | Cents per<br>pound | 1,000<br>pound       | Cents per<br>pound | 1,000<br>pound | Cents per<br>pound   | 1,000<br>pound   | Cents per<br>pound   | 1,000<br>pound | Cents per<br>pound              |
| October    | !              |                    | 1                    | -                  | !              | -                    | -                |                      | 1              | 1                               |
| November   | : 20,000       | 3.30               | !                    | !                  | !              | 1                    | -                | -                    | 20,000         | 3.30                            |
| December   | 22,000         | 3.30               |                      |                    | -              | 1                    | !                | 1                    | 22,000         | 0<br>0<br>0<br>0<br>0<br>0<br>0 |
| January    | : 14,000       | 3.34               | 000,09               | 3.30               | -              | 1                    | !                |                      | 74,000         | χ.<br>Υ. α                      |
| February   | 20,000         | 3.25               |                      | 6                  | -              |                      | !                | !                    | 8, c.          | 2.67                            |
| March      | <del> </del>   | -                  | 10,000               | 3.30               | 1000           |                      | 1,7              | , e                  | 1.8 700        | ر.<br>ال                        |
| April      |                |                    | 15.000               | 30,                | 2 C C C        | 3.10                 | 32,000           | 30.6                 | 55.800         | 3.14                            |
| MAN        |                |                    | 500,01               | 200.5              | 5              |                      | 7,000            | 3,03                 | 19,000         | 3,13                            |
| June       | ייי כר         | 3,225              | \$ 6<br>\$ 6<br>\$ 6 | 3,53               |                | !                    |                  |                      | 13,804         | 3.23                            |
| Angust     | 2              | ) ! ! !            |                      |                    | !              | -                    | !                | -                    |                | -                               |
| Contombor  |                |                    | -                    | !                  |                | -                    |                  | -                    |                |                                 |
| Total      | 86,000         | 3.29               | 100,804              | 3.28               | 10,590         | 3.10                 | 96,000           | 3.07                 | 283,394        | 3,23                            |
|            |                |                    |                      | Valley             |                |                      |                  |                      | U.S. Total     | 1                               |
|            | Mis            | Mississippi        | •• 189               | Tennessee          | •• ••          | Area                 | Area Total       | ***                  | •• ••          | Average                         |
|            | Quantity       | : Average          | Quantity             | •                  | Average :      | Quantity             | Average price 1/ | Trem's               | ••             | price 1/                        |
|            | 1 000          | Conte ner          | 1,000                |                    | Cents per      | 1,000                | Cents per        | 1,000                | 90             | Cents per                       |
|            | punod          | punod              |                      |                    | 3d F           | punod                | punod            |                      | pun            | ponnod                          |
| 1968/69    | ••             |                    |                      |                    |                | ļ                    | ļ                | 1                    |                | -                               |
| October    |                |                    | Ĭ                    |                    |                |                      | !                | 20,0                 | 00             | 3.30                            |
| November   |                |                    | i                    | !                  | -              | -                    | -                | 0,5%                 | 000            | 3.30                            |
| Technology |                |                    | i                    |                    |                | -                    | !                | 74,C                 | 000            | 3.32                            |
| Dobailed y |                | Ì                  | i                    | .!                 |                | -                    | -                | 20,05                | 8              | 3.25                            |
| represent  |                |                    | i                    |                    |                | -                    |                  | 10,0                 | 000            | 3,30                            |
| April 1    |                |                    | i                    |                    | -              | -                    |                  | 48,7                 | 06,            | 3.14                            |
| May        | 2.600          | 3.00               | 1,461                |                    | 3.00           | 4,061                | 3.00             | 59,861               | 361            | 3.07                            |
| June       |                | -                  | i                    |                    | -              | -                    |                  | 67                   | 24             | ٠,<br>د<br>د<br>د<br>د          |
| July       |                |                    | i                    | -                  |                | !                    |                  | ,<br>1               | 2              | 0.43                            |
| August     | -              | -                  | i                    | -                  | -              | -                    | <br>             |                      |                |                                 |
| September  |                |                    | i                    |                    |                |                      |                  | 327 400/.0           | 25             | 2 03                            |
|            | 000            | 000                | ראון ר               |                    | 20             | 1 061                | 000              | 4, 102,10            | (2)            | 0.60                            |

1/ μ1% protein, bulk, f.o.b. crushers' mills. 2/ Net figure. Meal tenders accepted totaled 382,000,000 pounds, of which 94,544,400 pounds were withdrawn.

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was acquired. May was the second heaviest month (55 million pounds) followed closely by March (53 million pounds). The CCC acceptance of crude oil resulted in a stronger market--from about  $10\frac{1}{2}$ /c per pound in November 1968 to nearly  $11\frac{1}{2}$ /c in June 1969.

January 1969 was the heaviest month of CCC acceptances of cottonseed meal--74 million pounds or a fourth of the season's total. May was the next largest month (60 million pounds) followed by April (49 million pounds).

\* \* \* \* \* \* \*